

# FOR TEACHERS OF TO-DAY

J. EADES



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John Eades.

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Modern Ideas put into Practice

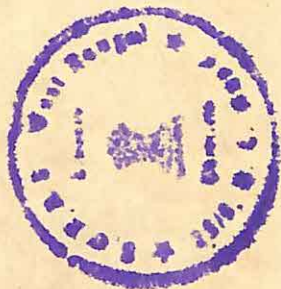
BY

JOHN EADES

Formerly Headmaster of Kirkstall Road Demonstration  
School, Leeds

Author of "Literature Teaching in Schools," the "'A.L.' New English Course,"  
the "Dalton English Course," etc.

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## DEDICATED

TO

All the members of the Kirkstall Road Demonstration School Staff, Leeds: Messrs. A. C. Martin, E. A. Green, L. Dixon, N. G. Dean, B. R. Browning, W. Smith, C. L. Sayer, A. Dunning, G. Unwin, Misses M. Such, E. M. Knapp, B. Varley, and Mrs. W. H. Perkins, without whose loyal and enthusiastic co-operation this experimental work could not have been carried out.

## PREFACE.

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THE Great War flung most of the old educational ideas into the melting-pot; and the fresh views of education which are the outcome of the "melting" process call for our consideration.

None of us can be content to jog along at the same pace, or to use invariably the same methods as satisfied our schoolmaster grandfathers; so we ought to be willing to give the changed ideas a real test, and not turn them down as though everything new was a fad, and everything old was perfect.

In trying out some of the new ideas we may go astray now and again, but we shall get somewhere worth while in the end, without seriously damaging anybody.

This book gives an account of the ideas underlying some experiments made at the Kirkstall Road Demonstration School, Leeds, of which I was Headmaster for twenty-six years. It also gives a detailed description of the working and results of the experiments.

Over 2,000 teachers and other people interested in education have visited the school during the last ten years, and have seen the methods in operation. These methods are being continued and developed by my successor, Mr. T. K. Winfield.

To these visitors, and to many others in various parts of Great Britain to whom I have had the pleasure of lecturing, this book will be of some interest.

JOHN EADES.

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## CHAPTER I.

### CHANGING METHODS.

IN the days of our great grandfathers the main point to be discussed when appointing a teacher to a post in a school was whether the man knew his subject. If he was expert in classics, mathematics, or science, he was regarded as being quite capable of teaching boys and girls anywhere. Some of these men knew nothing of the workings or growth of the child mind, and nothing of teaching methods as we understand them. Some of us know what it is to suffer the inflictions of a clever student, but incompetent teacher, and we would relieve our pupils of similar sufferings.

But not all the teachers of other days were of this sort. Richard Viney, a schoolmaster of the eighteenth century, said the aim of teaching was:—

“To endeavour to give children such ideas of learning as are true, solid, and engaging; never to set them to learn anything for a punishment, but rather deal so with them, that, instead of dreading going to school, they may rejoice when the hour comes, and think it too short when 'tis over.”

And again he says:—

“When we find at any time that a child's genius leads him to one part of learning more than another, we think it best to assist his genius the way it turns, and make use of such times as good opportunities of forwarding him, and not make him sit puzzling



himself, and spending days and weeks in trying to learn a thing which at another time perhaps he'll learn in half the time."

Most of this is very modern, but at that time he was like a voice crying in the wilderness.

When compulsory education came into force, more attention began to be directed to methods of teaching. Training Colleges sprang up, and teacher-candidates who secured a first-class Queen's Scholarship spent two years or more in one of these colleges, equipping themselves in knowledge and technique for their life's work.

But long years elapsed before the nation's children benefited from the training which the nation's teachers received, for the very good reason that they were not allowed to put into practice methods which they had learnt, and which they knew to be soundly educational.

The Government Education Department of those days insisted upon having its pound of flesh, and other valuable products of education were disregarded. To the work of the teacher it applied a rule-of-thumb method known as "Payment by Results." All teachers were then compelled to have as their chief aim the child's acquisition of facts. The skit of the time was :—

Ram it in, jam it in,  
Children's heads are hollow.  
Slam it in, cram it in,  
Still there's more to follow.



And because the teacher's bread and butter depended upon this being well done, knowledge was driven in by a liberal application of the cane, or, as one old dominie put it, "What would not go in at the head had to be driven in at the tail." No wonder school children hated lessons and schools and everything and everybody connected with them. The merest novice to-day knows that most of a teacher's work for the differing minds of different individuals cannot possibly be weighed and measured all in the same way. Prolonged and patient labour with one child will show a result far inferior to what much less effort will obtain with another child whose mental equipment is of a better type.

Sad to say, there are still commercially-minded people who regard school education as something which, if applied to the separate brains of all the children in a class, will produce a uniform result, just as so much petrol applied to a number of motor-engines produces a uniform measure of horse-power. Of course, school education does nothing of the kind. It depends not only upon the teacher, but upon the pupil; not only upon the giver, but upon the receiver. It never produces equality; in fact, the more of it one applies, the greater are the resulting inequalities. A teacher can no more get the essentials of learning into some minds than he can change the baser metals into gold. All he can hope to do is to develop to the fullest extent those natural gifts which are included in the

child's physical, intellectual, moral, and spiritual inheritance.

In the ordinary council and non-provided schools, the teacher's time and skill and effort ought to be spent in opening the windows of each child's mind and letting in the light from all that is good and beautiful and true. It should be devoted to training him to use his brains in the best possible way and for the best possible purposes. It should aim at producing in him a strength of mind and will and character, and should inspire him with such noble ideals as will give him self-reliance, balance, stability, and a high standard of values by the time he has to apply himself to the duties, responsibilities, and intricate problems of modern civilized life. It is vitally important that children should be trained, not only how to take care of their bodies and how to enlarge their minds, but how to behave themselves, how to deal fairly and generously with their neighbours, how to use their powers and advantages for others as well as for themselves, and how to realize that life is a great thing and well worth living.

The right sort of training is never a mere external process. It begins with the senses, goes on to the intellectual, and then to the moral and religious life ; that is, to the perception, and then to the appreciation, of all that is worthy. To develop a fine athlete and nothing more would be mere animal training. To give pupils so much scrappy knowledge, and provide them with a few "accomplish-



ments," would be totally inadequate. To spend most of the time on the moral and religious side would leave them physically frail and intellectually anæmic. True manhood, or true womanhood, is the result of a harmonious growth of body, mind, and soul; of stature, wisdom, and grace.

The Greatest of all Teachers placed a little child in the midst, but His method was for long years overlooked. In the eighteenth century Jean Jacques Rousseau, the French philosopher, in his *Émile*, a treatise on education in the home, again called attention to it. Some years later, Johann Heinrich Pestalozzi, the great Swiss educational reformer, did still more. Before his time, teaching, as we understand it, was unknown. There was no systematic method at all. Pestalozzi speaks of popular instruction as "a bottomless swamp." All that the teacher did was to set lessons to be memorized, and the pupil had to repeat them by heart when his turn came. Pestalozzi saw that if the best was to be done for each child, his parent or teacher must make a careful study of his natural tendencies, his general development, and his childish interests. It is to him that we owe many great educational principles which are the basis of present-day teaching, such as the recognition of the child's individuality, his right to a reasonable measure of freedom, his need of opportunities for self-expression, and his love of activity. He was the first to show us that geography teaching ought to begin out of doors; that the

child's interests are first of all centred upon familiar things, that the concrete should precede the abstract, and that children are more truly educated through what they themselves do, than through anything else. Froebel and Signora Montessori have taught much the same things. Others of us have tried to put these ideas into practice. But, for various reasons, some adequate and others inadequate, not much headway with the newer methods has yet been made in the majority of schools, though the future holds boundless possibilities.

~~Ed 126~~  
CHAPTER II.

INDIVIDUALITY.

~~Ed 126~~  
Dr. Stanley Hall has given us a new word to indicate the transfer of emphasis from the school subject to the school child; the word is "paidocentrism," which means that the child is the centre and object of the teacher's work; he is more important than anything else in the school, or in the educational world.

William James, the great psychologist, in one of his valuable *Talks to Teachers*, said that one of the profoundest remarks he ever heard was made by a man who was working at his house. This man, in conversation, said there was very little difference between one man and another, when you came to analyse them, but what little there was was very important.

It is this little difference, this individuality, that prevents life from being a dreary monotony. Individuality is not temperament, or instinct, or character; it is a spiritual quality that distinguishes one person from another; it is something given to us at birth. It shows itself in the attitude we take to life, and the way we meet life: it is our own special and characteristic way of expressing ourselves and of doing things; it is our point of view, from which we see life, and act upon those things that constitute our environment. Through our individuality we make our contribution to social and public life, and



so (if the contribution is a right and proper one) increase the value of the common stock. It is the teacher's business to respect the individuality of each child, and for that reason the pupil, and not the class, must for most things be the school unit.

It is obvious that in many schools, even to-day, it is not possible to make the child the teaching unit, however much the teacher may desire to do so. Apart altogether from the many unsuitable, drab, out-of-date buildings, wherever there are classes of fifty to sixty children the individual is swallowed up in the mass; and, except during inspirational lessons in such subjects as Scripture, literature, and some sections of history and geography, where numbers may be an advantage, any attempt to teach such a class is to attempt the impossible. All the teacher can hope to do in ordinary lessons with such a crowd of children is to try and keep them in order, and "rub" a little instruction into them. No reasonable person can call this sort of thing education. Progress in method and organization is impossible, where such a state of things exists. At the same time, it must be acknowledged that in most schools much more consideration could be given to the individual child than is usually given.

Children are as unlike in their mental and emotional capacities, as they are in their facial expression. They are born with or without certain intellectual and emotional gifts. If these have not

been inherited, no teacher in the world can create them. The naturally bright child is bright all through life, unless his mind is stunted by bad teaching methods, or bad treatment. The naturally dull child remains dull to the end of the chapter.

We have to remember that every time any child receives a new idea, it is acted upon by the ideas he already possesses ; and, since these ideas are never exactly alike in any two minds, it follows that no two pupils can have exactly the same resultant idea of anything. Here, again, we see the need for studying each child individually, and dealing with him according to what we find him to be. We must get to know all we can about his home conditions, his habits, companions, likes and dislikes, and in that way find his point of contact, and discover how to deal successfully with him, just as a competent medical man makes numerous enquiries before he diagnoses the case of one of his patients. We have an opprobrious epithet for the man who treats all patients out of the same bottle, or with the same pill ; and a teacher who treats his pupils in a similar way merits the same epithet.

Owing to the absence of this individual study and treatment in days gone by, many mistakes were made regarding the ability of some pupils, as their subsequent careers adequately proved.

To-day we have a better means of gauging a child's mental capacity than our forefathers had. Investigations have shown the wide range of mental



differences among children. Some of ten years of age are equal mentally to others of fourteen, and some only equal to others of seven. Moreover, children are so unequal in their rate of assimilation and development, even the same children differing widely at different times, that no refinement of classification can be adequate. The work must be made to fit the child, and not the child to fit the work.

When we have estimated a pupil's mental capacity, we must do everything possible to develop his talents to the full. And we can do this best by preparing a suitable environment for that development, providing abundant material with which the pupil can work, giving him all the guidance and help necessary day by day, and by seeing that he makes the best use of his time and opportunities. This, along with the parallel development of the child's moral powers, is the supreme work of the modern teacher.

He must also seek to train each child so that any special and particular personal endowments he may possess will not be lost in the process, but will be matured and developed, both for the pupil's own good, and for the enrichment of our common life. It is of vital importance that, for at least a year or two before a pupil reaches the school-leaving age, the teacher should find out any special aptitude he may have, and cultivate it; for special endowment of every kind is potentially a social asset, as well as

an individual possession. Moreover, its cultivation will obviate the calamity of any child leaving school with the miserable feeling that he is "no good at anything." He may be very backward in the 3 R's, but there is always the chance that he has capacity in some other direction. It must be discovered, and then he can be developed through that. Immanuel Kant says :—

"Education is the development in the individual of all the perfection of which he is capable."

That development must be our daily aim.

### CHAPTER III. INTELLIGENCE.

The assertion is often made, usually by people in commerce and industry, that the curriculum of the elementary school ought to be contracted, and more time devoted to the 3 R's: Reading, wRiting, and aRithmetic. This looks quite reasonable to the uninitiated layman, but to the educationist it is merely plausible.

When the system of "Payment by Results" was abolished, a reaction set in, as is usual in such cases. The accumulation of facts, and the cultivation of accuracy by persistent repetition work, were soon at a discount, and inspectors and administrators began to ask for the development of *intelligence*.

But what, definitely, was this intelligence? It was generally assumed to be something which could be "drawn out," and readily developed. So men like Professor Dewey, Professor Thorndike, and Dr. Stanley Hall in America, Professor Spearman, Professor Karl Pearson, and Dr. Cyril Burt in England, and other scientists on the Continent, set to work to investigate the nature of intelligence.

Up to the beginning of the twentieth century, what is known as the "faculty" psychology held the field. The idea seemed to be that the powers of reason, memory, and imagination were, in a sense, separate from one another, and therefore could be separately developed and trained. In fact, the



psychology of that day seemed to be a not very distant relation of the old-fashioned phrenology, which received its death-blow, when, in 1906, Professor Karl Pearson published the results of his long and careful investigations into the relationship between intelligence and the shape and size of the skull. He found that if such connection exists, it is so slight as to be of no use whatever for making inferences.

The "faculty" psychology did for a time secure a place in the sun, and special subjects and exercises were used in the schools to develop the various "sections" of the mind. Mathematics and classics in secondary schools, and arithmetic and grammar in elementary schools, were the chief instruments employed to develop the "faculties" of reasoning and will, to make pupils think, and to cultivate general accuracy, attention to detail, and the power to tackle life's difficult problems. Splendid, if it had been true ! But it was not true, as the researches of the above-mentioned men of science clearly show.

Professor Spearman in his great work, *The Abilities of Man*, proves that power gained in the study of one subject cannot be transferred to deal with another subject. He tells of one of the big Railway Companies which puts some of its prospective employees through a ninefold test :—  
(1) combination, (2) fixation, (3) concentration, (4) observation, (5) reckoning, (6) distractibility, (7) speed, (8) dexterity, (9) quick grasp.

In his examination of the "concentration" test, for example, he tells us that the candidate has two lists of numbers given to him, and is told to cross out all the numbers appearing in both lists. If there is a "faculty of concentration," then ability to go through this test successfully will also indicate power to concentrate on the study of a text-book, or on the solution of a problem in geometry or engineering, or, in fact, to concentrate upon anything. But it does not do that. The Professor brings abundant evidence to show that it does not measure a person's power to concentrate even on tasks allied to that of crossing out numbers.

In the same way we have no centralized "speed faculty" which operates in all kinds of actions. The speed at which a boy races out of school is no indication of the speed at which he can work problems in arithmetic, or the speed at which he can write good composition; and the speed at which he can work sums is no guide whatever as to the time he will take to go an errand. So we must remember that improvement made in the study of one subject does not manifest itself in other studies, unless they are very closely allied. One can never sharpen children's wits in a general sense by giving them periodical doses of grammar, algebra, arithmetic, or physical science; they can be sharpened only along the lines of the subjects taken.

Alfred Binet, the famous French psychologist, who first invented a scale of mental measurements,



was of opinion that intelligence has three main characteristics :—(1) purposefulness, (2) adaptability, and (3) power of self-criticism. Dr. Burt says, "Intelligence is inborn, all-round mental efficiency." In other words, it is the inborn power to acquire, organize, and use knowledge. Or, to put it in another way, intelligence is common sense as shown in the ability to deal successfully with new and maybe complex situations and circumstances.

But what of that "general intelligence" we hear so much about? Professor Thorndike in America, and Professor Spearman in England, have both been engaged in protracted and independent research along this line. Professor Thorndike concludes that there is no such thing as "general intelligence," and that whatever intelligence we possess is made up of particular intelligences. A person may, for example, be intelligent in dealing with literature, and dull in dealing with economics; intelligent in mathematics, and stupid at politics. Was not Laplace, the great French mathematician, dismissed by Napoleon, because he was an incompetent statesman?

Professor Spearman is of opinion that there is a central nucleus of inborn intellectual power, or general ability, which energizes all the specific abilities that a person may possess. In his judgment, this inherited power cannot be improved by education, nor destroyed by the lack of it.

It is obvious to every experienced teacher that

children are undoubtedly born with or without certain mental gifts ; if they are without them, no exercises ever devised can "draw" out what is not there.

Surely these conclusions show the necessity of developing in school pupils as many special abilities as is reasonably possible. We may liken the inborn capacity of a person to the hub of a cart-wheel, and the special intelligences to the spokes. If we picture a wheel with three spokes, we shall have some idea of what a child's mind would be like, if his school exercises were confined to the 3 R's ; such a policy would produce a race of narrow-minded people who would soon make short work of the British Empire, for they would think they knew everything, while all the time they were grossly ignorant.

Alfred Binet, already referred to, who died in 1911, was director of the psychological laboratory at the Sorbonne, that is, at the University of Paris. He invented a scale of mental measurements, the underlying principle of which is that normal children can do certain things at a certain age. He experimented upon a large number of children of various ages, and so fixed his scale for each age. Roughly speaking, he found that 50 per cent of school children have a mental age corresponding to their actual age, 25 per cent are above it, and 25 per cent below it.

Many advances have been made on Binet's tests by various psychologists, Professor Terman in particular ; but a good deal more research work has



to be done before any of the proffered intelligence tests can be accepted as quite reliable. What is tested is frequently cleverness, rather than intelligence, and perhaps Dr. Drever, of Edinburgh University, is right in insisting that there ought to be "performance" tests in which the pupil has to deal with the concrete, as well as the ordinary intelligence tests, which deal only with ideas and symbols. But these latter tests are certainly a better means of gauging a pupil's mental ability than the passing of an examination for which he has been carefully prepared by "spoon-feeding" and cram.

Dr. Cyril Burt has tried to get nearer the truth than Binet, by making a survey of a London borough where there were 20,000 children attending school, and varying in ages from 8 to 14. He found that when 100 was taken as the normal or average, only 81 children had an ability represented by 130; which means that there were 81 children who, at 10 years of age, were equal in mental ability to average children of 13. At the sub-normal end of the scale he found not 81, but 501 children who were, in some measure, mentally deficient. In their cases, at the age of 10 many of them were equal in mental power only to normal children of 5 years of age.

It is a very difficult thing to draw a line of demarcation between normals and defectives. Even if the intelligence quotient is below 70, there may be other undiscovered factors which, later on, will make a difference. If a child has a mental age of



three years or more below the normal, he is usually transferred to a Special School, should there be one in the district. If his mental age is less than three years below the normal, he is retained in the ordinary school. It is the dull child in the ordinary school, the one who is two years below the normal mental age, that is the teacher's problem. In the usual classification of pupils, it means that children twelve years of age are working with nines and tens, an arrangement which, to say the least, is very undesirable. Dr. Burt calculates that, in the ordinary elementary schools, there are 10 per cent of dull and backward children. Numerous causes contribute to this unfortunate mental condition, some of which are removable, and ought to be removed. These are irregular attendance at school, curable physical weaknesses, neglect, and wrong methods of teaching. There are other factors which, being in-born, cannot be removed, such as weak intellect, inability to grasp certain school subjects, irregularity of mental development, and certain defects of character.

How are these backward children, averaging 25 to 30 in an elementary school of 300 pupils, to be adequately dealt with? In certain up-to-date schools, they are gathered into one class, placed in charge of a capable, sympathetic teacher, and taught individually and in small groups. The chief drawback to this method is that the children miss the stimulus of the cleverer pupils in an ordinary class.

It can be obviated in some measure by allowing them to mix freely and frequently with the others during play and in games ; but the feeling of inferiority induced by being put in a "Special Class" still remains. Under the system of teaching described in this book that feeling can be eliminated. For children such as these the assignments can be modified to suit each particular case, and then they can be retained in their own age class.

After the age of 11+, academic subjects must be allotted less time, and be given less attention, when dealing with dull children, than when dealing with those of normal ability. Whatever subject makes no appeal to the natural interests of dull children, and will be of no use to them in after-life, either for work or for leisure, must be scrapped. While using every endeavour to teach them whatever elements of number they may need, and how to write an ordinary letter, emphasis must be placed upon physical training, handicraft, music, interesting literature, accompanied by some dramatic work, and concrete subjects generally.

Efforts should be made to give these children an interest in a suitable hobby. As they get older, it will become increasingly important how they spend their leisure time, in fact, this is a matter of importance for people in general. In the near future the right use of leisure will have to be dealt with in the schools, in a more systematic way. This matter will be referred to later in the book.

By the combined efforts of parents, school medical officers, psychologists, and teachers, much more can be done to make the dull and backward section of the school community self-supporting, clean-living, and law-abiding people.



## CHAPTER IV.

## THE CURRICULUM.

There are educationists, more especially on the Continent, who argue that when a child is able to read, and can understand and use the four rules of number, his education should proceed only in those subjects for which he has an inborn tendency; others, which may be required in later life, can be taken up when they are likely to be wanted.

There is something to be said for this idea; but one cannot lose sight of the fact that the neglect of subjects which form the groundwork of any real education, must inevitably cause the pupil to suffer a serious handicap later on in life. After a certain standard of attainment has been reached, more liberty can certainly be allowed.

The question of different types of schools and curricula is one for careful enquiry and consideration. At present those children who are 11 to 12 years of age are usually placed in a certain type of school according to their parents' social position and financial resources, and little or no account is taken of the child's own inherent tendencies. That cannot be the right method; it must lead later on to many young people taking up certain branches of professional, commercial, or artisan work, for which they have no real liking or capacity, and that means drudgery for themselves and loss to the community.

The ordinary school is not the place for vocational

training ; but with children from 12 to 15 years of age it is possible to pay more attention to their inborn desires and tendencies than is usually done now, particularly if they are not proceeding to any higher school. Every specialist teacher knows that when he has done his best, there is a percentage of children taking his subject, to whom it is not, and never will be, of value, or a means of enjoyment. It is at least arguable that, in cases such as these, the teacher's time and effort, and the pupil's time and effort also, are largely wasted. It must be recognized that what is one child's educational meat is, so to speak, another child's educational poison. One child will thrive intellectually on a course of Latin and Greek ; another child will be intellectually starved on it. One will "feed" well on mechanics, another on literature, and another on handicraft. All this must be discovered, and the various subjects must be used for the pupil's benefit. If a child of 12 is making little or no headway in the ordinary academic subjects of the curriculum, but is keen on art, or handwork, in one or more of their numerous sections, then a large proportion of his school-time should be devoted to these things, and only a small proportion to the others. The necessity of broadening the curriculum, so that the right kind of work can be given to every pupil of 11+ and over, is imperative. Wherever possible, a school for senior children should be large enough to have two or three different "sides" to it, into any



one of which pupils can be drafted, as occasion demands. It is frequently impossible to decide upon the type of a child's future vocation at the early age of 11+, and facilities for transfer from one section of a school to another section could be readily made when necessary; whereas transfer to a different type of school would often entail difficulty and delay. Of course, it is indispensable that the teachers have a free time-table, so that different children can be given different types of work at various times for varying lengths of time. This means greater freedom for the teacher, and more opportunity to use his skill and knowledge for the direct and immediate benefit of every pupil in his charge.

A good deal is being heard just now about the "Activity School," which carries out the principle of "Learn by Doing." Johann Heinrich Pestalozzi, who was born at Zurich in 1746, was the pioneer of this great principle, and his teachings have had a profound effect on educational thought and practice from his own day until now. He taught children on his farm at Neuhof. They worked there, and the instruction they received had a direct connection with the work they were doing. He believed in the educational value of manual work, and the leading educationists of to-day take the same view.

Certain schools in this country, a hundred years ago, adopted the Pestalozzian methods, but they



had formidable obstacles to face. At that time, handwork of any kind was looked upon as something that could be made to pay its way by selling the products of the children's labour, and that attitude caused the educational aspect of organized handwork gradually to become quite a secondary matter. And added to this drawback was the emphasis that the Church placed upon its own traditional form of education by books and memorizing, such as would furnish a foundation upon which the doctrines of the Church could be built. Handicraft found no place in this scheme of things, owing to its greater expense, its "debasing" connection with industry, the policy of the Church, and the subsequent introduction of "Payment by Results." Thus its banishment for half a century was complete.

However, merely cramming the memory with facts, many of them useless facts, as the only method of education, produced the inevitable re-action. Supported by the increasing study of psychology and educational method, handicraft began, some forty-five years ago, to emerge once more as a valuable means of education for school children. But so deeply had the old cut-and-dried *memoriter* methods struck their roots into the educational soil, that progress has been both painful and slow. Even now, handicraft is still a "subject," usually taught in a Centre, which is cut off from most of the schools that send pupils there.

Craft work, as well as ordinary handwork, which

is often used as an aid to the teaching of mathematics, geography, history, and science, must occupy a very important position in the curricula of the new Senior Schools, and it should always be of such a character as will lead up to a genuine craft. To make a doll's furniture in paper or cardboard, and then colour it, is quite a legitimate thing for little children to do, if only for the joy it gives them; but anything which older children make ought, so to speak, to lead somewhere. If, for instance, paper-work is done, it ought at a later stage to embrace book-binding.

Weaving with raffia, macramé string, wool, cotton, linen, or silk, is very interesting work, and when the result is a useful bag, a purse, a mat, a tea-cosy, or a pair of slippers, a pupil feels that it is well worth while.

Clay-modelling will sometimes be a species of art work, as when modelling a pear or a banana; and sometimes it will be elementary pottery work, as when modelling a cup and saucer.

• Handwork of various kinds can be utilized. Objects can be made in cardboard, and natural decorations added. Leather-work, book-binding, and embroidery can be taken up, though probably leather-work will be found too expensive. Woodwork, light metal and repoussé work for boys, and plain and fancy needlework, cookery, laundry, house-craft, and mothercraft for girls, along with drawing, painting, designing, and gardening for both boys



and girls, should find a place in the curriculum provided for most of the children.

Courses of practical every-day science should be drawn up for boys, and of nature study for girls, and other courses on physiology, hygiene and temperance for both boys and girls.

The co-operative construction of a good-sized model of some historic building, such as Kirkstall Abbey, Temple Newsam, Adel Church, or York Minster, situated not far from the school, will bring into practical use English, mathematics, geography, history, handwork, art, and architecture. Such work will prove to be deeply interesting, and will be carried out with the utmost eagerness. It will also form an introduction to Project Work, which is dealt with later on in this book.

In addition to this side of the work, and apart from the Scripture lessons, which must be regarded as of first importance, varying amounts of time should be spent on literature, letter-writing, dramatic work, physical training, including games and dancing, music, lantern and cinematograph talks, visits to neighbouring works, and school journeys for the study of nature and the inspection of places and objects of geographical or historical importance.

There must be more practice in oral speech and mental arithmetic; and, apart from letter-writing, written composition must be drastically cut down, and written arithmetic too.

A time-table giving the names of the subjects,



the teachers taking them, and the rooms in which they are taken, during both the morning and the afternoon session, will amply suffice. All schemes of work must be looked upon as *guides* only, to be modified by the teacher in any way which will suit the needs of individual children.

No competent teacher will be content to have somebody else's ready-made schemes foisted upon him. Each school is a distinct problem to be solved by the combined efforts of the whole staff, whose aim will be to do the best possible for each individual child, for the school as a community, and for the district in which the school is situated.

## CHAPTER V.

## SPECIALIST TEACHING.

Specialist teaching, which is a necessary part of the organization described in this book, was adopted at Kirkstall Road Demonstration School over twenty years ago. At that time it was almost, if not entirely, an unknown thing in an elementary school ; but, since then, the method has spread far and wide, and is now, more or less, in use in the upper classes of all the best schools. The amazing thing is that there are still large numbers of head teachers who think that their assistants are capable of teaching every subject on the time-table, even to children in the higher classes ; but any such assumption is a delusion. Not one teacher in a thousand can do it with any measure of real success. Many make the attempt, and manage to give their pupils sufficient of the dry bones of history, the bald facts of geography, or the rule-of-thumb tricks in English and arithmetic, to enable them to pass certain examinations ; but the new education very properly refuses to accept that sort of teaching as being of any permanent value.

How many things connected with the different teachers of our own younger days are burnt into our memories ! There was that teacher who taught subjects he did not like, simply because he had to do it, and who, day by day, bored us to exaspera-

tion, and made us dislike most of the subjects he tried to teach.

But there was that other one who knew his subjects thoroughly, and loved them; he was a great inspiration to all his pupils. Subjects usually considered dry, became deeply interesting when handled by *him*. Under his guidance we saw the delectable mountains in the distance, willingly travelled over a rough road towards them, and made our first efforts to climb them. Teachers of his type held the golden keys that unlocked for us the gates of the fairy lands of knowledge, and made every school day a day of discovery. We felt our minds expanding and our spirits thrilled, as we were led into a new and enchanting kingdom.

To teach any subject successfully and well, a teacher must be years in advance of his pupils, both in his knowledge and in his practical experience of the subject. Some are not more than half-an-hour in advance of them. Moreover, he must really like his subject, and be enthusiastic about it, or he will never impart a liking and enthusiasm for it to those he teaches.

The specialist teacher achieves greater success, because he arouses more interest in his subject, and is much better informed with regard to it. How many ignorant inferences, statements only half true, and even false statements, have been made in history lessons by teachers who had not been able to pursue the study of the subject sufficiently to know it thor-



oughly ! It is only the teacher with a wide and deep knowledge of any subject who can give a simple, understandable presentation of it, and at the same time keep strictly to the truth. It is only such a teacher who can select the most fitting material to present to his pupils, according to their age and capacity.

Specialist teaching is as much an advance on the "all-in" method, as the modern motor-bicycle is an advance on the old "penny-farthing" bicycle. In the industrial world, machinery that has had its day is scrapped. In the same way any obsolete methods in our schools, useful though they have been in their day and for their circumstances, must also be scrapped, when their day of usefulness is over.

The folly of asking any teacher to teach nature subjects, or art, or music, or physical training to senior scholars, when he knows little or nothing about it, has been realized long since. It is equally foolish to expect the best all-round results in English, mathematics, physical science, geography, history, or handicraft, from teachers of very limited knowledge, and little or no enthusiasm for these subjects.

It is sometimes argued that specialist teaching gives children a wrong idea of knowledge through splitting it up into sections which are in more or less "water-tight compartments," so that a child comes to think he is not working at English, or drawing, or handicraft, unless he is doing what has to be done

in the particular room set apart for the subject. A little guidance from his teachers will correct that, and lead him to see that subjects are treated separately only for convenience in teaching and study. If correlated pieces of work, involving, for example, contributions from history, geography, geometry, art, and handwork, are done, as at Kirk-stall Road School, the fact will be made still plainer to him.

But is there no splitting-up of knowledge, where specialist teaching is not adopted? The ordinary class time-table splits all the subjects into little bits, and gives twenty minutes to one subject, thirty to another, forty to a third, and so on, all to be as rigidly adhered to as an Act of Parliament. This arrangement insists that, at the sound of a gong, youthful minds must be immediately flung from literature or composition to mathematics, or science, often when children have just got interested in the subject. This is another bit of worn-out machinery that ought to be on the scrap-heap.

Again it is said that the specialist teacher, compared with the class-teacher, knows little of the individual child. But anybody who has taken part in both systems knows that this is not true. As a specialist, the teacher has far more knowledge of the individuality, capacity, temperament, and peculiarities of the children than any class-teacher can possibly have. He has the same children during three or four years of their school career, and notes



their physical and mental growth during the whole of that long period, their change of outlook, and general development ; he is thus enabled to deal with them as individuals in a much more suitable way than is possible for a class-teacher, who, as a rule, has them in charge just for one school-year, and after that has no further dealings with them.

The specialist teacher is never expected to attempt the impossible ; he never has to try to arouse and maintain a personal interest in all the subjects of the curriculum. Instead of wasting his time in trying to do that, he spends it in diving deeply into the literature of his own two or three subjects, finding out the fundamental principles underlying them, and the best methods of teaching them ; for ability to teach is, naturally, a *sine qua non* of any educational system. Granted that ability, and then it may be said without any qualification that specialist teaching is a much more powerful and efficient educational instrument than the old "all-in" method. Every unbiassed observer, including Government and local inspectors, has long since realised this fact.

At Kirkstall Road School each specialist teacher has a room of his own, well supplied with illustrations, apparatus, textbooks, and reference books, suitable for the teaching and study of the particular subject or subjects taken there. He is also a form master who always takes the Scripture lessons with his own boys, has charge of their sports, and is responsible for their registration. His special subject-



room is also a classroom for his form, when the pupils are not working according to the individual method, as during each afternoon, except Wednesday.

An important point emphasized is that each teacher, with the co-operation of his boys, should spare no pains in trying to make his room attractive. The ideal of beauty is one that every teacher should aim at cultivating in the minds of his pupils—beauty of character, of work, and of environment. We never realize our ideals, because, as we reach out towards them, they ascend. So be it! But, though a sense of the beautiful really arises from within us, outward beauty consciously and unconsciously exercises a refining influence upon us, and, to a greater degree, upon the growing and impressionable minds of our pupils. So we must never stint in striving to make our classrooms pleasing and attractive. They should be clean and bright, the floors free from litter, the colour-scheme pleasing and cheerful, the pictures as far as possible copies of works of art, and plants and flowers should find a place.

Numbers of our pupils come from homes which are somewhat drab and bare, and if we can give them a taste for what is artistic and dainty and beautiful, and help them also to appreciate tidiness and cleanliness of person and surroundings, to take a pride in the appearance of their room and their school, we shall have done them a great and lasting service.

## CHAPTER VI.

### BOOK-LEARNING.

In the Middle Ages there were few books, and so race knowledge of the past had to be handed on from generation to generation by word of mouth, or by means of valuable manuscripts. The monasteries and the old universities were the only repositories of that knowledge. The student had to store his mind with matters of erudition and scholarship while he was "at school," because in the outside world he would not have access to them.

How strange it is that in so many schools children are being taught as though the outside conditions had seen no change since those far-off times, and equally strange that many so-called "practical" people cry out against "book-learning" as they term it. They are never tired of saying that school children are too "bookish," and not practical enough, ignoring the fact that there is as much practical work of various kinds in the schools of to-day as there is book-work.

Books play a very important part in the Kirkstall Road School methods; why should their use be condemned by those who wish to be thought "practical"? Books contain the accumulated knowledge and wisdom of all the ages. By them our children enter into the glorious literary heritage that is theirs. It is by books that they come into close



contact with the greatest minds of all time, and therein lies the essence of all true education. Book-reading is a fundamental necessity for everybody; without it a person's outlook is cramped, his ideas are circumscribed, and his intelligence is stunted from lack of experience; in fact, he is illiterate.

The primary duty of every school is to teach children not only the mechanics of reading, but to read intelligently, and to love reading. Their desire to read must be awakened by telling them about some of the wonderful things that lie open to their quest, and by giving them specimens of them. When they realize what charming and enjoyable delights are to be found in books, they will labour to acquire the means of getting at them; and when that becomes their aim, they will never be "sick of books," as the saying is, when they leave school.

In these days there are public libraries filled with all sorts of books. There are encyclopædias, atlases, magazines, and newspapers in abundance, to give facts as they are needed. Children must be taught how to use these reference books. There are also learned societies, institutes, and lecture-courses, from which senior pupils can learn all about the latest discoveries in science, art and travel.

Many people are of opinion that too much fiction is read in these days. As far as school children are concerned, they should be allowed to read as much as they like in their spare time, so long as what they read is not pernicious. If they are trained at



school to read books of travel and biography, as well as to study good textbooks, they will not be satisfied, when they leave school, to spend all their spare reading-time on fiction, as many grown-ups, especially women, who have been taught on the old methods, are doing to-day. The superficial reader feeds on thrills, and rarely stops to think about, or to criticize, what he has read. He takes it all for granted; the writer carries him along, and he agrees with everything he says. This state of mind is due mainly to mass teaching and "spoon-feeding" in the old-fashioned schools. It is also seen in the sheep-like way in which multitudes of people follow the lead of any glib chatterer on politics, economics, or religion, who happens to blurt out something uncommon or outrageous.

If they will, the schools can inculcate worthier ideals, and create higher tastes in reading, among their pupils, first of all by leading them to see and feel the superiority of the best standard literature, especially when compared with the printed garbage which is now published in such quantities, and then by giving them a critical interest in, and a power to analyse, any set of facts by which they may be confronted. Can our youths and maidens in their later teens read the best magazines and journals intelligently and with enjoyment? Can they select from the mass of information in our newspapers those portions that are of real value? Can they hear or read a political speech, probe its weaknesses,

appreciate its strong points, and, in fact, sift the wheat from the chaff? Can they do the same with "leaders" and contributed articles? To enable them to do all this is far more important work than teaching them how to solve tricky problems in arithmetic, or getting them to memorize so many useless facts in history.

A child can be taught to think as early as he has any knowledge on which to exercise his thinking powers. From his earliest days he is acquiring facts, and continues to acquire them, irrespective of teachers or schools. He should be taught to ponder over those that are worth while, and add them to his stock of general knowledge.

## CHAPTER VII. DISCIPLINE.

There is a good deal of talk in these days about discipline, "free" and "not-free." One has only to mention the Montessori Method, the Dalton Plan, or the Play Way, to some people, and they exclaim, "Oh, yes, that means letting children do as they like, does it not?" But such a remark shows a curious misconception of the subject.

It is no easy matter to train up children in the way they should go, because each individual child is a special case, requiring special consideration and treatment. Really this training can be secured only by the co-operation of parents and teachers, and the more these compare notes, the better for the children. Perhaps when Nursery Schools are more widely established, disciplinary training will be easier than it is now.

It is a matter of general agreement that healthy, well-disciplined, morally good children are the finest asset that any nation or empire can possess. Children who have been well brought up, and carefully trained to lead good, healthy, honourable lives, can never be too grateful to those worthy parents who have so nurtured them.

But there are others; and, speaking broadly, the present generation of parents is probably more guilty than any previous one of spoiling their children. In some measure, it may be a re-action from



the severity and cast-iron strictness of a generation or two ago ; but, in many instances, it is due to the not over-wise desire of parents that their children should have a good time all the time. When that is so, discipline and effort and endurance, which mould and develop sterling character, are set aside as irksome and undesirable. Some parents who are taking this line, say they are bringing up their children on Montessori principles !

Authority, represented by the parent, or teacher, or the community, knowing from experience what is likely to be for the common good, says to the child, "Do this," or "Don't do that," and, as a rule, says it very frequently.

The child, ignorant of social conventions, or of what makes for the general welfare, and impelled mainly by his instincts, wants to do as he likes, and to experiment "on his own." But sometimes such experimenting would be dangerous to himself, as well as objectionable to others. Herbert Spencer's theory that a child should learn from experience, and through suffering the consequences of his own actions, can be carried out only to a certain point ; taken to its limits, it would lead to his destruction. Moreover, a young child is often incapable of connecting cause and effect, and then the consequence does not teach him the necessary lesson. Children must be protected from what might be the dire effects of their childish inexperience and rashness.

The problem of discipline is to find a happy

medium between letting a child do as he likes, and making him into a little machine which acts only when, so to speak, somebody touches a button. The one extreme is as destructive of self-respect as the other ; both are serious hindrances to the growth of worthy manhood or womanhood. We must not harbour the idea that the one or the other method is inevitable ; rather must we study the child's temperament in such a way as will enable us to direct his impulses into suitable channels, where he can harmlessly let off superfluous steam, and learn valuable lessons in self-control, and in showing respect for the wishes and comfort of others. To have consideration for the rights and feelings of other people is one of the first duties of civilized life, which every child must learn to put into practice.

Disciplinary training should begin while the child is an infant in arms, by getting him accustomed to regularity of feeding-time, sleeping-time, and bath-time. When this is done, a vague sort of idea soon begins to dawn upon him that he is being attended to in a regular way. He will quickly come to expect it, and will be content with it. One important thing to remember is, that, as he gets older, whenever any promise is made to him, it should be faithfully kept, so that he will learn by experience that you mean what you say. If he is told he cannot go out to play, he must not go out to play. If he is told he must be in bed by 7 o'clock, he must be there to time. His idea of obedience has its origin at



home in usage and custom, which must be continued throughout the whole of his school life, and then it will be easy for him to "carry on" later in local and national life, in obedience to the laws and customs of his municipality and his country.

There are still parents and teachers whose only idea of altering a child's behaviour is to resort to corporal punishment. These people really belong to a much earlier generation, one which believed not only in the tawse and birch, the dunce's cap and the "red tongue," but also the wooden collar—a very uncomfortable necklet—and the leg-log—a real log of wood which had to be dragged round the school by the culprit amid the jeers of his fellows.

Those were days when a troublesome pupil was often compelled to hold half a dozen slates in each hand at arm's length, until he dropped from sheer exhaustion.

This kind of treatment produced dead silence in school, and satisfactory results at examinations. It also produced hooligans, who, a few years later, frequently found their way into gaol. Unless great care is exercised, corporal punishment stunts the growth of the judgment and of the will, and then it becomes mainly responsible for making great masses of people like so many sheep, ready to follow any demagogue who screams about something in our parks and public places, or to repeat the foolish slogan of anybody who shouts loudly enough.

Punishment with many people means "getting



your own back"; it is a species of revenge. The attitude of the modern educationist is very different. He believes that all punishment should have a preventive and remedial purpose; there ought to be nothing revengeful in it. It is only an emergency measure, and emergency measures rarely, if ever, effect permanent cures. Moreover, there is always the possibility of punishing a child for an unintentional or unavoidable offence; and when that unfortunately happens, it creates in him a feeling of resentment against the one who has inflicted the punishment, and that weakens his (or her) influence over the child. Children are quick to feel the injustice of being punished for something they could not avoid. It is wise to find out first the cause of an offence, and then try to estimate the effect of whatever corrective measures it is intended to adopt, before actually applying them. It is a crime to punish a child just to relieve our own feelings, or because we are irritable and angry.

Experience teaches me that frequent corporal punishment has one of two effects—either it tends to break a child's spirit, or it blunts his sense of shame. In the first case, it makes a coward of him, and unfits him to face the difficulties of life. In the second, especially if the child is of an obstinate disposition, he will take the blows without wincing, and probably without any feeling of humiliation. In fact, he becomes hardened, and may then easily slip into a life of crime.

Let us remember that every child has a "soft spot" somewhere, if only we will take the trouble to find it. Love is stronger than punishment, and the proper manifestation of it works miracles of reform in the characters of troublesome young people, with whom harsh and repressive measures would utterly fail.

Having said that, I want now to deal with another aspect of this important subject.

Since the conclusion of the World War, some people seem to be opposed to discipline of any sort. In the House of Commons, some time ago, a prominent member suggested that, in certain circumstances, a soldier should have the right to refuse to obey orders. It ought to be clear to anybody that the admission of any such claim would at once reduce an army to an armed mob, acting according to the whims and prejudices of its component members.

It is not easy to be patient with those who see no virtue in anything but being able to do as one pleases, regardless of the rights of others—a doctrine of selfishness which, if carried out by everybody, would reduce our ordered life to utter chaos, and our present freedom to a state of virtual slavery.

Army discipline is necessary for armies, but school discipline should never be army discipline. Children should never be dragooned by the methods of the army drill sergeant. And yet, discipline is a vital factor in every school worthy of the name.



No successful work can ever be accomplished without good discipline, and the only discipline that is good is self-discipline. That power must be cultivated in pupils as a first essential of success. Unless the concentrated attention of young learners to the matter in hand can be secured, a good deal of time will be wasted. The impression which anything makes upon the memory is mainly in proportion to the amount of attention given to it. One is more likely to secure this attention if school work is, as far as possible, made enjoyable both for teacher and pupils. This can usually be done for the pupils by making a constant appeal to their curiosity, which is always keen, by arousing their interest, and keeping it active, and by giving them plenty to do.

It is vitally important that we ourselves endeavour to hold fast to some portion of our own childhood's sense of wonder. Just as a child with wide-open expectant eyes looks at life day by day, gradually discovering its miracles and its mysteries, so should we who are of maturer years look upon earth and sea and sky, upon nature's wonders and beauties and glories in all their sublime variety, and also upon the achievements of modern science, with similar feelings of eager, tingling wonder. When we feel we have exhausted all the awe and mystery of life, and when nothing arouses our curiosity or excites our enthusiasm, we are really old and dying, no matter what the calendar may say regarding our



age. When men or women teachers reach that stage, they ought to be requested to give up teaching, for their influence upon young people cannot be anything but baneful. The teacher who keeps his own sense of wonder alive, and shows real interest in his work, will rarely fail to arouse similar qualities in the minds of his pupils.

Many advanced educationists tell us to-day that what children need in school is merely a suitable environment, containing plenty of material to work with ; this being provided, they can be left to themselves, or at least with very little supervision, to develop freely what is in them. Let me say bluntly that young children cannot do it to any reasonable person's satisfaction. "Self-realization," the term in vogue with this group of educationists, is somewhat of a catchword. There are certain elements in most selves which ought never to be allowed to develop. Moreover, the wayward impulses of young people are often beyond their control, and they need and respect the type of teacher who can help them to bring these into subjection and keep them so. In no other way can effective work be done.

Discipline must, first of all, be external ; but it should gradually pass from that stage to *self-discipline*, the more advanced stage in which the pupil has under complete control the various impulses, desires, and habits which form the major part of his personality.

Every well-informed parent, and every teacher,

knows that true discipline is an aspect of the mind, not a position of the body. Any visitor, even one with but slight knowledge of modern educational methods, is at once aware, on entering a school where folded arms and military attention are very much in evidence, that the teachers are drivers rather than leaders, detectives rather than educators. And when natural tendencies are systematically crushed, children become inattentive, restless, and rowdy at every available opportunity. There has been something faulty in the training of a boy, who, when he leaves school for work, fritters away his time as soon as the foreman's back is turned, or does "jerry" work, and then tries to cover it up when his employer comes round, or only does the right thing for fear of being caught doing the wrong one. Every pupil ought to be trained to practise self-control, and then, later on, he will be able to control himself, even under provocation, in the larger sphere of life.

Very few children are naturally idle; they must be doing something, and unless something worthy and useful is found for them to do, they will find for themselves something less worthy and less useful. Idleness is the parent of mischief everywhere. The pupil who is inclined to be troublesome must be constantly and usefully employed. Working such a one to the last ounce is the secret of the successful disciplinarian. We must arouse in our pupils a sincere desire to use their mental powers as vigorously and eagerly as they use their bodily powers, when



they are playing football or hockey. To pass anything less than their best is to do them moral injury. Scamped, untidy, or dirty work should never be accepted. Children must be taught to scorn anybody who fails to give of his best when at work, just as they would scorn a "slacker" on the football field.

But the teacher must not only reject work that evidences slackness and slovenliness and slatternliness; he must also have an eye, and a word of praise, for the least improvement upon past efforts. Such commendations are a real stimulus to a struggling pupil, and fill him with a determination to do still better. When this attitude to all school work is fully developed, it will have an influence for good, which will be seen in a pupil's work in future years.

Let it be said finally that sympathy on the part of the teacher is essential for success in teaching. Sympathy with child life in general, the capacity to put one's self into the child's place, and to see occurrences and difficulties with his eyes, is invaluable, even indispensable, and makes a world of difference to the general harmony, and to the happiness of teacher and pupils alike.

At Kirkstall Road School discipline is easy, but there is no licence. The naturalness of the children is frequently remarked upon by visitors. They are not afraid to laugh, nor are they backward at entering into conversation with anybody who desires information or explanations. There is a happy



feeling in every department of the school, teachers and children being on the best of terms with one another. Employers in the district have a preference for boys trained on these lines ; for, in the words of one of them, " They can carry on without the foreman being at their elbow all the time."

## CHAPTER VIII.

### CHARACTER-TRAINING.

At Kirkstall Road School we have made character-training one of the chief planks in our educational platform. In some quarters, to-day, work of this kind is deprecated.

There are certain educationists who think they are very modern, when they declaim against any interference with the trend of a child's character. Dr. Blatz, at one of the meetings of the British Association, said quite seriously, "Parents should get out of the way of the children." If we are to take the statement at its face value, it is sheer nonsense. If it means that parents should not hinder the self-development of their children by seeking to help where help ought not to be given, we shall all agree. A child should not be encouraged to run to his mother, or to his teacher, every time he is up against a little difficulty; he should be led to think out his own solution first, and left for a time to try and overcome the difficulty himself. In matters of this sort, parents and teachers "*should* get out of the way."

On the other hand, unrestricted natural development has its attendant perils. There are undesirable elements in the natures of most children, as in most grown-ups, which ought never to be allowed to develop; and to tell parents to "get out of the way,"

and allow the weeds to grow without interference, is a plain absurdity.

There are multitudes of parents, to-day, whose value to their children is incalculable ; and all along the centuries there have been those whose good influence upon their children, and through them on the world at large, has had wonderfully beneficent effects. The wise parent is always a help, not a hindrance.

One recent writer on various phases of education, who has evidently been reading some of Mr. Bernard Shaw's *obiter dicta*, refers to people "who are eager to spread the belief that the full requisites of education can be satisfied by what they call the provision of character-training."

I have talked to large numbers of teachers and other people interested in education, and I have met none who hold that view. When the writer goes on to say, in a superior and patronizing way, that "it is quite unnecessary to be too severe with the advocates of character-training, or to take their explanations of themselves too seriously," one is content to leave him to the tender mercies of Dr. F. H. Hayward.

Sir John Adams says :—"Given the same first-class mind, we may turn out an Artful Dodger or a James Watt ; given the same third-rate mind, and we may develop it into a Bill Sikes, or a more than respectable artisan."

Lord Leverhulme, when opening a completed portion of a new secondary school at Bolton, a gift



from his father, said this :—" My father believed that the fundamental object of education was the making of character, not the cramming of facts."

Sir Stanley Machin, Past President of the British Chambers of Commerce, in an article in the *Yorkshire Weekly Post* recently, said, " Character is our greatest business asset throughout the world."

I believe that with all my heart. It is the business of the parent and the teacher to guide the growth and development of the child mind into the way of righteousness. My long experience convinces me that unless we make sure that in our schools moral training and practice keep pace with intellectual development and the acquirement of knowledge, we are often doing more harm than good.

A young child is as imitative as a little monkey, and during his early years he is always busy imitating people—their speech, actions, and mannerisms. This urge to imitation leads him to develop ideals, and they will almost invariably be in keeping with his environment.

A child eagerly receives impressions from his surroundings. Suggestions of various kinds, often unspoken, come to him from his playmates, his casual acquaintances, his school, his Church, and his reading, as well as from the privacy of the family circle. It is here that he finds the materials out of which he builds his ideal world. How important, then, it is, that the material for his building should be of the best !

Some children have an inherited power which enables them to resist and overcome evil influences, but it is not so with the great majority. There are people who argue that young folks must feel the sting and consequences of evil doing, if they are to be cured of a liking for it; but that is a dangerous theory. We cannot possibly deal with the developing character of a boy or a girl by taking the view that the young person needs experience in wrong-doing in order to know the folly and cost of it. *Experientia docet*, certainly, but, driven too far, it defeats itself. With most children it would ruin them for life.

The power of suggestion, which is now recognized and acted upon by teachers and medical men everywhere, is of great value in this vital section of school work. Children are especially open to it, and both parents and teachers can exercise a wonderful influence over young people by suggesting the right things at the right time.

Canon Peter Green, of Manchester, in one of his books, gives us a fine example of the value of suggestion, in the case of a school-fellow of his who had been guilty of a serious offence, and was birched for it before the whole school. He says:—

On the following Sunday, when Green and Brown Secundus, as the boy was called, were sitting together, Brown said,

“You know our House-master is not the man to put his arm round your neck, and call you pet names. He has never called me anything but



Brown Secundus. Well, the night after I was birched, he sent for me. When I went into his room, he stretched out his arm and said, 'Come here, Charlie.' When I went and stood by him, he put his arm round me, and said, 'Do you know, I was very sorry for you to-day. I am sure you are not the sort of boy who would be likely to do that.'

"I was so surprised that I said, 'But I *did* do it, sir.'

"'Oh, yes,' he said, 'you did it, I know that; but we all do silly things sometimes, and wonder afterwards how we came to do them. I believe it was like that with you. I don't believe you would have done it, if you had thought for a moment. Anyhow, I shall go on believing in you, and feeling sure that you really are a nice, honourable fellow whom I can respect and call my friend.'

"It's funny, isn't it? When I was birched, I was angry and miserable; but when he talked like that, I was sorry and happy, and I am going to show him he was right."

The Canon adds:—"From that moment the boy made good."

That House-master was a great man and a great teacher; we ought to sit at his feet. It is of the utmost importance to let children see we have confidence in them, and expect that they will do the straight thing; it will give them confidence in themselves, and help them to develop a loyalty to worthy ideals, which will hold fast even when they



are compelled to be in contact with people of vulgar tastes and unsavoury morals.

Where the home conditions are bad, as in the slum quarters of our great cities, the teacher's work in this direction is extremely difficult. And when the home influences smell of beer and betting-slips, the general environment is hostile to the formation of good character, and the teacher's efforts are largely neutralized.

Every experienced teacher knows that there are *some* parents to whom children are an encumbrance and a nuisance; they feel no sense of duty with regard to them, and, but for the teacher's efforts in various directions, it would go hard with the unfortunate mites. Happily, the great majority of parents are of the opposite sort; they are always willing and eager to support and supplement the work of the teacher, and with very happy results.

We must not lose sight of the fact that a child's mind is plastic, imitative, open to suggestion, and educable; its character is being moulded, either for good or for ill, by the ideas it imbibes, and the influences brought to bear upon it, consciously or unconsciously, by everybody with whom it comes into close daily contact. The fact that character can be moulded into a good and useful type, is proved beyond cavil by the kind of youths and maidens turned out by Dr. Barnardo's Homes, and the National Children's Home and Orphanage. Many of these children have been picked up in the streets

and slums of London and other cities and towns of Great Britain, and have an unenviable inheritance ; yet their characters are so moulded in these institutions, that 97 per cent of them become honest, respectable citizens.

We cannot afford to pooh-pooh the character-training in our schools. Surely Germany has taught us the tragedy of a misdirected education. She used to be the educationist's Mecca. But there was a fly in the German ointment. That great country flung aside the law of the moral life as so much useless lumber. Might became right with the result that her people have passed through the heart-breaking experience of seeing the gains of centuries swept away in the tornado of war.

The lesson we have to learn from their fearful mistake is this : we must train our children to recognize and resist the forces of evil within and without with all their might, and at the same time we must feed their minds on noble and worthy ideas and ideals, and guide and support them in their daily striving to reach higher levels of moral and spiritual achievement.

When we ponder over the fact that the stoppage of moral endeavour on the part of only one great nation produced an avalanche of horrors which almost overwhelmed modern civilization, we feel the wickedness of letting character take care of itself.

The call of the hour is to educate our young people for righteousness as well as for industry. The

Scripture lesson, if taken in the right way and in the right spirit, is a powerful instrument for this particular work. Merely to know the Biblical facts is not of much value in itself. The lessons to be learnt from them, and the ideals which underlie them, must be indelibly stamped on the hearts and minds of our pupils by precept and example on our part, and by daily practice on their part.

“Thou shalt not” must be used sparingly. The aim must be to fill their minds with a genuine love of all that is good and beautiful and true, and to generate in them a constant desire to do things that are kindly, worthy, and “of good report.” If we do this in our schools to-day and every day, we shall be teachers to some purpose, and may count ourselves the most useful servants the State possesses.



## CHAPTER IX.

## EXPERIMENTAL WORK.

IN THE  
BEGINNING.

In September, 1919, after a good deal of experimenting, Miss Helen Parkhurst began to apply what she called a "Laboratory Plan" in a school for crippled boys. It was an undoubted success, and aroused general interest. This led to the decision to apply the same Plan to the boys and girls of the High School in the town of Dalton in Massachusetts, U.S.A. This experiment was begun in February, 1920. A little later the Dalton High School was visited by Mrs. Sanderson and Miss Belle Rennie of London. They were both deeply impressed by what was being done, and, on their return, Miss Rennie wrote some articles in the *Times Educational Supplement* giving a full account of what they had seen. Thus was the Dalton Laboratory Plan launched in this country. For a complete account of it readers must refer to Miss Parkhurst's book, *Education on the Dalton Plan*, published by Messrs. G. Bell and Sons at 5/- net.

During the latter half of the War period, we at Kirkstall Road School, Leeds, began to overhaul our ideas on child psychology, and school organization, and methods in general; and we came to the conclusion that in the future, as far as was possible, the child, and not the class, should be made the school unit for teaching purposes. The reasons for

this change-over have been given in Chapter II, on "Individuality."

It led us at the beginning of September, 1918, to try a plan of individual work with the top class of the school, in English, mathematics, geography, and history. A weekly amount of work, which was then called an "Allotment," was given in each of these subjects. After introductory talks and explanations, private study and practice were carried on with such books as were then available, largely supplemented by teachers' notes, and as much individual help and supervision were given by each specialist teacher as time would permit. Some time later physical science, and also art and handicraft, were brought into the scheme.

When Miss Rennie's articles appeared in May, 1920, we began to experiment with some of Miss Parkhurst's ideas. The subject rooms for English, mathematics, physical science, geography and history, art and handicraft, were extended for the use of the four senior classes. Each room contained the necessary books and material, as far as we were able to secure them, and was in charge of a specialist teacher, who could give the right atmosphere for a profitable study of his subject. The term "laboratory" was not used, as it was so closely associated with science work. "Units of work," and similar terms, were not adopted.

While some of the new ways were being tried, I was asked to write four articles on our work for *The*



*Teacher's World.* Later on, these were revised and included in Miss Parkhurst's book.

Since then, as the result of further experience, a number of changes have been made at Kirkstall Road School; for whenever an experiment did not come up to our expectations, we did not hesitate to scrap it.

**CHANGES.** At first we extended the Plan to include boys in the intermediate section, ages 9 to 11, but abandoned it after two years' trial, as we found that these boys lacked the necessary foundation and experience for such work; but they continued to be taught as far as possible on individual lines, and were gradually prepared to take up more responsibility later on. At present Dalton work is confined to children of 11+ and upwards. The classification is on an age basis; those of 11 to 12 are in Senior 1 class; 12 to 13 are in Senior 2; 13 to 13½ in Senior 3; 13½ and over in Senior 4. This applies to 95 per cent of the children on the roll. The few children, who, though not mentally defective in the ordinary acceptation of the term, were found to be mentally and physically unequal to most of the work of their actual age class, were put into the class most suitable for their mental age. By means of group teaching and individual teaching, it was found not difficult for slower children to take work within their mental range; while, in such subjects as music, physical training (including games and



sports), and handicraft, the age classification was found to be a great advantage.

**ASSIGN-  
MENTS.**

Assignments are made for all those subjects which are taught mainly on individual lines, namely, English, mathematics, physical science, geography, history, art, and handicraft; and these are, for the most part, taken during the morning session. The year's work in each subject for each class is divided into ten suitable sections, one for each month, from September (the first month of the school year) to June of the following year. July is used for revision and examination purposes, and August is a holiday month.

Instructions for study, and the accompanying notes are made by each specialist teacher, and submitted for my approval, so that as far as possible subjects may be kept in proper perspective. Specimens are given in the appendix.

The English taken includes spelling, the study of many of the best passages from standard authors, oral and written composition, grammar, and the individual reading of numerous authors. The greater part of the English work for any ordinary school is contained in the eight books of my *Dalton English Course*, written for pupils from 7 to 15 years of age, and published by Messrs. E. J. Arnold & Son Limited, of Leeds.

Class lessons in literature, mainly on the writings of modern authors, are given in the afternoons, and

select passages of poetry and prose are memorized. Class teaching, mingled with individual and group teaching, is also given in the afternoon session in such subjects as physiology and hygiene, nature study, music, physical training, games, and dancing. Where lessons can be made inspirational, especially those on Scriptural subjects, those in English literature, and some in history and geography, it is an advantage if the class is fairly large, owing to the "sympathy of numbers." Class teaching is also brought into use whenever any general information, or specific instruction suitable for all, has to be given.

**WASTING  
TIME.**

Our experience is that where the old-fashioned class teaching largely predominates, and individual teaching is the exception, much valuable time is wasted. Many children are doing practice-work every day in things with which they are perfectly familiar. In spelling lessons many of the children know the words quite well, and there is no need for them to spend time in writing and repeating them again and again. Those who do *not* know them should be listed, and required to learn them. Even these should not be told to write corrected errors three times each, as though they were all of the same difficulty to them. Some errors are mere slips, and once writing is sufficient; others are real difficulties, and may need writing twenty times before they are finally mastered. Nor should time be spent in learning to spell uncommon



words, which will never be used by pupils anywhere out of school.

The same criticism applies to handwriting. Fifty per cent of the pupils, except those in the lowest classes, write well enough for all ordinary purposes ; and yet, in the set handwriting lessons, everybody in the class is given the same amount of writing practice. The good writers ought to be doing other work, when this lesson comes round.

Time is also wasted in geography lessons by trying to get into the children's heads unimportant physical and political details of various countries ; and, in history lessons, by requiring pupils to memorize so many particulars of certain kings, battles, and treaties, which are of little or no value, except, possibly, for examination purposes, and which, if ever required, could readily be found in reference books.

Time is wasted in practising so many hundreds of problems in arithmetic, in the hope that pupils will be able to solve one or two tricky ones when an examination comes round. It is also wasted on various other types of sums which are of no use to the children, and probably never will be.

It is further wasted by so frequently giving out and collecting lesson material, which ought to be in separate lockers, or desks, or where it is easily accessible to the children who need it. Taken altogether, this wasted time mounts up astonishingly in the course of a year. We cannot afford to waste



time in this way, as every available minute is needed to deal adequately with the subjects referred to in the chapter on "The Curriculum."

**MORE  
INDIVIDUAL  
TEACHING.**

Far more individual teaching can be done in most schools than is being done to-day, even in subjects usually taught "in the mass." There is really no more justification for wholesale mass teaching in physical training and singing than there is for it in other school subjects. Physical exercises, in which every pupil does exactly the same thing at exactly the same time, as in various public displays, or when a large class is going through certain precise evolutions to the music of the piano, are very pleasing from the spectacular point of view, but, educationally, they are almost worthless. If physical training is to be of real value, the exercise must be suited to the physical condition and needs of each pupil. There are some exercises that a whole class can take, but there are others which need explaining to individuals. They should be told what physical or remedial effects any particular exercise is expected to have, they should then be induced to concentrate their thoughts upon it, and be set going singly, or in twos, threes, or fours, and urged to do it well.

So with singing. There must be not only the mass singing of songs, hymns, and part-songs, but a good measure of individual singing. Teaching separate children how to sing, and training their

voices and ears, ought to occupy at least as much of the allotted time as collective work.

**CHOOSING  
THE TIME  
FOR  
SUBJECTS.**

For three years we experimented in allowing boys at the beginning of the morning session to take any subject they preferred, and continue working at it all the morning, if they were sufficiently interested; at the same time we advised them to keep in mind that the other subjects had to be completed by the end of the month. But we had considerable difficulty in getting some boys to do the necessary work in important subjects which they did not like, with the result that they made little or no progress in them; their favourite subjects absorbed too much of the time. Not only so, but they spent too much time in doing a certain amount of work, often taking a whole morning to accomplish what ought to have been finished in half the time.

It must be granted that, in an elementary school, a reasonable knowledge of simple mathematics, the power to spell common words correctly, the ability to read intelligently, and to express one's self well in oral and written speech, are fundamental. These, at the very least, must be acquired.

Many of our children would persist in having, so to speak, dessert before dinner, often too much dessert and too little dinner, so that their educational "digestion" was upset, and their educational "balance" destroyed.



Finally, we told the boys that, in the wider world of life *outside* school, they would have to put first things first, even though they disliked them, and that we should have to do the same *in* school. So we changed the order of working, and insisted on the assigned work for the month in each subject being done first to each teacher's satisfaction; and he, of course, judged the result in the light of his knowledge of each child's mental powers. When that was done, time left over till the end of the month could be used by the pupil in "free" work; that is, in pursuing his favourite study, or studies, to his heart's content.

**REGARDING  
PACE.**

We also experimented for three years in allowing children to complete their monthly assignments of work as quickly as they liked, and then to proceed at once with the work set for the following month. This resulted in a number of sharp children completing each year's work in seven or eight months, while slower ones took from twelve to fifteen or more months to cover the same ground.

With the former section, careful probing showed that their knowledge was somewhat superficial and fleeting, through their having been in too big a hurry; in fact, the depth and permanence of their acquirements did not satisfy us. Teachers were always ready to explain difficulties for them, or put them in the way of solving them for themselves;



but some pupils often thought they understood difficulties when they did not, and that was a state of mind not easily discovered.

In the latter or slower section, many of the pupils felt the lack of stimulus, and an inability to rely upon themselves; and as they continued to fall farther behind, they got disheartened, and that was a serious drawback. There was also the danger of their getting into the habit of thinking that their own pace would be accepted when they left school and entered the workshop; and if they did that, we knew they would be in for a rude and painful awakening.

It must be recognized that there are some children who have not sufficient will-power to take the place of the urge usually supplied by the teacher. They get on better with a little "ginger."

The work of the teachers, too, became very difficult through trying to cope with so many children who were at different stages of a subject. Even group discussions were not easy, for the members of a group were often at different stages of the same assignment. So we discontinued that arrangement.

For the past four years we have worked on the principle that in every good school there should be class teaching, group teaching, and individual teaching; class work, group or team work, individual work, and independent work, by which is meant work of the pupils' own choosing.

Class instruction in any subject is followed by group teaching for those who are slower in taking the matter in, and then by individual teaching whenever and wherever the teacher feels it to be necessary. It is useless putting an arithmetic textbook into a young pupil's hand, telling him to read what it says about the rule of three, and then to go and work the examples given. Young children need a good deal of teaching, and lack of time and large classes stand in the way of individual teaching on a very extensive scale, though it must predominate. A really good lesson by a capable teacher is still, and always will be, the most valuable educational instrument we possess.

During individual work and study there is considerable interchange of thought and ideas between pupil and pupil, and between the teacher and his pupils. His aim is not to take all the sting out of their work, but to get them to face up to it; so, instead of solving things for them, he is constantly putting them in the way of finding out things for themselves. A teacher can do no greater service for a pupil than to induce him willingly to attack a difficulty again and again, until he clears it up. It is a splendid thing for him to learn that if he is patient and persistent in trying to do a piece of work, he will ultimately be victorious. And when he once wins "off his own bat," he will become keen on repeating his conquests over other difficulties, he will find great joy and zest in doing it, and will soon



become conscious of a power within himself that enables him to deal successfully with awkward situations that crop up in ordinary life. To inspire a pupil never to accept defeat—so that whenever he is “up against it,” as we say, he will go through with it, head erect and undismayed, refusing to be beaten by any of the problems which life may fling at him—is probably the finest thing a teacher can do for him.

Each pupil is required to spend a minimum of two hours per week in each subject room, until his monthly assignment in any particular subject is completed. But it must be borne in mind that the assignments are enlarged or diminished to suit the needs of different pupils in the same age class. If a pupil is quick at mathematics, and finishes his allotted portion in good time, he has so much more time to spend on the other subjects, with some of which he may be a good deal slower. The assignments in all subjects must be completed before independent work is permitted. Very slow boys, and those who have been absent through sickness or otherwise, make up for lost time, as far as possible, by homework.

**CO-OPERATION.** The principle of co-operation is acted upon wherever possible. Although co-operation prevails so extensively in various departments of life outside school, it is only in recent years that it has received any definite recognition inside the schools.



We realized long ago that children develop best in an atmosphere of mutual helpfulness, and that if school is to be a training ground for the best kind of citizenship, service to one another, and to the school as a community, must be made a leading feature of its organization.

It is one of the first duties of a teacher to find daily opportunities for children to help and care for one another, to lead them to prove by experiment that "it is more blessed to give than to receive," to serve than to be served; and if they learn that lesson well, it will be of more permanent value to them and to the community, than will many of the other things we teach in our schools.

Some children are readily responsive to any stimulus leading to acts of helpfulness; others require frequent appeals and constant practice to induce them finally to volunteer to help anybody. They are often keen on their own work, but will do little or nothing to help a fellow-pupil over his difficulties. Their one aim is to secure their own advancement. It is *I, my, mine, me*, every time. This type of child needs constant watching and regular training, if any idea of unselfish service is to be developed in it.

Children must be urged to share one another's difficulties, and encouraged to talk about them with those who are dealing with the same things. This is what would be done in ordinary life, and it is a means of gaining experience. When a pupil is allowed to

discuss a subject with his fellows, and with his teacher, it not only widens his views of it, but it fixes the matter more firmly in his mind, and in a far more interesting way than by the usual wearisome class revisions and repetitions that are employed to achieve this end.

Co-operation between teacher and pupil must be as easy and natural as that between pupil and pupil, for the teacher's skilled guidance, encouragement, and inspiration are in constant demand.

In Chapter X is given a photograph of a model of "Kirkstall Abbey Restored." Kirkstall Abbey is an ancient Leeds building, which has been in ruins for several hundred years. The model is a piece of realism, and a good example of co-operative work. It was made during the year by upper class boys, under the supervision of Mr. Loris Dixon, the specialist teacher of art and handicraft. It is constructed to scale, with the exception of the tower, which has been made rather larger. The whole model is about 3 ft. by 2 ft., and consists of wood and cardboard suitably decorated, and with coloured mica for the windows. It can be lit up; and when a record of an old Latin hymn is played by a gramophone hidden underneath it, one could easily imagine that a service in the Abbey was actually in progress. Similar objects can be made in any senior school, and it will be found that the making of them leaves unfading impressions on the minds of those taking part in the work.



**INDIVIDUAL  
READING.**

Great importance is attached to the practice of individual reading, which is mainly silent reading. And what a wealth of books there is to-day for young people, compared with the supply of former days ! Even fifty or sixty years ago they had to be satisfied with three or four books, instead of three or four hundred ; but it is more than likely that, owing to the multitude of books now available, something has been lost as well as gained.

The keen interest in the doings of a few imaginary folk, such as Robinson Crusoe, Gulliver, or Christian in Bunyan's *Pilgrim's Progress*, who were very much alive and very real to the young reader, and the thoroughness with which the reading was done, are now often replaced by something more extensive and more superficial. Careful and constant guidance and supervision are needed, if the best is to be got out of the time allotted for private reading in school. When we have given them "power to read," and taught them how to get the best out of any book, we must remember that such power and knowledge are of no moral value, unless we can also arouse and maintain in the minds of our pupils an interest in books of standard value.

I well remember the time when only three sets of readers were used in each class—a literary, a geographical, and an historical reader, with what was called a "supplementary reader" thrown in ; and these had to suffice for a whole year ! Of course,



they were read over and over again, until many of the children knew some parts by heart, so that even poor readers could read them fluently, which was very helpful when H.M.I. came to examine them.

During a reading lesson in those days, all the children in a class of fifty or sixty had to be looking at the same line at the same time, and woe betide the unlucky youngster who "lost the place"! Sometimes the teacher brought out to the front five or six of the worst readers, and made them take turns in reading aloud to the others in the class. And what a hash they made of it! It was a punishment to the readers themselves, but a still greater punishment to those who were compelled to listen to them. The pain that such procedure inflicted on the bright, active, and sensitive children in the class must have been particularly severe.

Welcome changes are now seen in all the best schools. The teacher is still there, but the character of his work is quite different. He is there to arouse in each child in his charge a real interest in reading, to guide him in his choice of books, to help with difficulties, to show him how to consult atlas, dictionary, or encyclopædia, and, in short, to be a source of inspiration to each pupil. So, to-day, reading lessons are looked forward to with joy, not with dread, and books are loved, not hated. They open the portals of fairyland, of wonder, of adventure, of mystery, and of romance—all so dear to the heart of the growing child.

At Kirkstall Road School every boy in the senior section, that is, of 11+ and over, is a borrower from the public free library, and, as a rule, reads one book every fortnight, much of it at school, under the personal supervision of the headmaster. These are not only story books, but books of travel, history, biography, nature study, science, and even music, games, and engineering; and they are occasionally supplemented by newspapers and magazines. It is of some importance in these democratic days that the older pupils in our schools should be taught how to read any section of a newspaper intelligently and critically. Newspaper proprietors and editors are usually quite willing to send a supply of back numbers, which will serve the purpose quite well. This will help to obviate what we now see so frequently: people who are content to take their opinions not only of politics, but of many other things, from one particular paper, without taking the trouble to find out, or to think out, any other point of view. It is not difficult to induce young adolescents to express their opinions on current topics; they may at first merely be giving opinions they have heard expressed at home, but they will soon begin to add their own ideas, and take a pleasure in doing it. All this widens a pupil's outlook and sharpens his wits, while his reading extends his environment, brings him into mental contact, as it were, with peoples, manners, customs, and countries which would otherwise remain beyond his ken.



I have been asked by visitors whether I **ENGLISH and ARITHMETIC.** considered English or arithmetic as the most important subject in the curriculum, as in many schools arithmetic seemed to take the premier place on the time-table.

My answer is that unquestionably the most important subject taught in any school is the English language and literature, from its beginning with letter sounds up to the study of the great English classics; and from the writing of single letters of the alphabet to the composition of idiomatic English prose. That needs no arguing.

We ought to create in the minds of our scholars a great pride in their own language. A finer vehicle of thought does not exist, and its world importance is extending. At the Peace Conference in Stockholm, held in 1919, an enquiry was made among the various nationalities regarding the suitability of the chief languages for universal use. The voting was as follows:—German, 1; Latin, 1; Spanish, 1; Esperanto, 5; French, 8; English, 29. That is a very definite indication of the way in which the wind is blowing.

No other nation has as great a book of prose as the Authorized Version of the English Bible; no other nation has a book of poetry equal to a volume of Shakespeare's Plays. A study of the English language and literature will cultivate the intellect, and discipline the emotions, as nothing else in the curriculum can possibly do.



There is a tendency in most schools, and especially in the senior classes, to spend on written work too large a proportion of the time allotted to English composition, with the result that the cultivation of correct oral speech is sadly neglected. Many children are required to produce at least two long written compositions a week, and the teacher labours early and late at corrections, the same process going on incessantly and indefinitely. If we are genuinely preparing our pupils for life, we are wasting a good deal of the time of the majority of them on an excess of written composition.

Possibly ten per cent of the children attending elementary schools in a good residential district go forward to secondary schools, and a few of these proceed to the university. They will need to do a considerable amount of written composition. But, in many districts, the number going forward will not reach two per cent; and this means that for the great majority of pupils most of the written composition done in school will be of little value when school days are over. What they will be required to do then will be mainly private letters or business letters.

Advocates of an avalanche of written work talk of its use as a promoter of intelligence, and of its training value; but that is harking back once more to the exploded "Formal Training" theory.

In ordinary life oral speech is in use a hundred times more than written speech. Most people have

to explain things to others very frequently ; and what a dreadful mess some of them often make of it ! Even well-educated politicians, many of whom are the products of our great Public Schools, and have spent years in construing Latin and Greek sentences, as well as composing in English, not infrequently fail to make people understand what their utterances from public platforms really mean, and they have to write to the *Times* to explain that the construction which certain people have put upon their words was quite wrong. If more time were spent in all our educational institutions in the practice of exact oral speech, these misunderstandings would rarely arise.

We endeavour to give our older pupils at least as much oral practice as written practice, not with the idea of making orators of them, but to give them the power to express their thoughts and knowledge, in clear, connected, and easily understandable speech. Moreover, this halves the amount of correction required, and enables the teacher to mark nearly all the written work at his desk, with the pupil at his side, which is really the only effective way of doing it.

As regards arithmetic, although, in my opinion, far too much time is spent on it in most elementary schools, it is too important to be relegated to a subordinate place in the curriculum.

Most teachers now know that all the talk about arithmetic training the reasoning powers for general



purposes, making children more mentally alert, and more accurate in what they do in ordinary life, may be disregarded. It has been proved practically beyond question by numerous and exhaustive experiments that these improvements are confined to the subject itself, and do not manifest themselves in relation to other subjects, as I have shown in Chapter III.

An influential committee of the British Association, including such experts as Dr. Cyril Burt, Sir Percy Nunn, Professors T. H. Pear, F. A. Cavenagh, Godfrey Thomson, and C. W. Valentine, has recently issued its Report on the subject of Formal Training, and that settles the matter for all of us.

In the introduction we read the following passage :—

“It is evident that, in the light of modern research, the extravagant claims made in the past for the unique value of certain subjects from the point of view of mental discipline, apart from their intrinsic value in the scheme of education, cannot be sustained.”

Professor Burt tells us that mind-processes consist essentially in specific associations between definite situations and definite responses, and that these associations are due to particular nerve-paths within the brain. The formation of one set of nerve-paths cannot influence the formation of another set of nerve-paths, unless they themselves are linked by similar associations. He says, by way of illustration :—



“Practice in subtraction will improve accuracy in division, because the latter involves the former; but it may have little or no effect on accuracy in multiplication.”

Professor F. A. Cavenagh writes as follows:—

“We no longer retain any school subject solely on the ground that it provides ‘mental discipline,’ nor do we speak of the ‘educative value’ of a subject. Educative value consists not in the subject *per se*, but in the way in which it is studied. It consists in ‘learning how to think,’ in forming interests or sentiments about a subject, and in building up such habits as perseverance, independent attack of problems, application of previous knowledge, etc. Any teaching which fails to foster such mental processes is uneducative, however much information it may succeed in driving in, or whatever examination results it may gain.”

There is no more to be said on that side of the question.

But everybody will admit that various sections of arithmetic have a practical value for ordinary life. In some instances, it may go no farther than calculating the number of hours a man has worked at so much an hour, thus enabling him to check the amount of wages due to him. In others, arithmetical knowledge and skill may be needed for dealing with large quantities of goods bought or sold, or with statistics of various kinds, or with accurate measurements in engineering. A good deal of grind has to

be done to make sure of any of these being possible. Any child who misses a thorough grounding in the four rules can never get very far with any later processes ; and as we cannot tell in the earlier years of any child's life how much arithmetic he will need later on, we must make sure that all children get the groundwork as far as they are capable of taking it in.

Let us remember that for fifty per cent of our pupils there can be a great deal of joy in the arithmetic lesson, when the essentials have been mastered. The solving of problems in arithmetic, like the solving of problems in algebra, or geometry, can be a source of as much pleasure as is felt in trying to unravel the plot of a good detective story.

As regards the position of arithmetic in the curriculum, I should place it next to English for pupils up to the age of 11+ ; after that, the time devoted to it would depend upon the needs of the individual child. In many instances, most of the time usually devoted to arithmetic might better be given to handwork, art, geography, or everyday science, while in others it would hold second place along with physical science.

**HISTORY.** History is another subject to which we attach considerable importance, as having a distinct bearing on the lives of the children after they have left school.



We are living in democratic times. Everybody nowadays seems bent on doing something for the people, and the people themselves are becoming very much alive to their own interests and to their new powers. But a democracy that is to be great and wise and permanent must know something of history and of the lessons it teaches. A democracy ignorant of history becomes the prey of pretentious quacks of all shades of political and economic opinions. The only way of avoiding this is to give our pupils a taste for history, and a desire to continue historical studies when school days are over. We must train them to study history, not in order to find means of bolstering up any particular set of political ideas, but to examine all the facts, and consider actions from various points of view, so as to form, as far as possible, unbiassed judgments of men and events. Then they will be better able to come to wise conclusions regarding any actions, occurrences, or circumstances which may confront them in the social, industrial, or political life of the future.

Historical knowledge is the beginning of all political wisdom. It teaches how to keep events in their proper perspective, tells how things happen, why changes are made, and why reforms are proposed and carried out, or rejected. It shows what kind of policy is likely to be effective, and what kind will prove a failure. It will help our future citizens to live better and more human lives.

Mr. Stanley Leathes says :—"History is never



dull unless it is made dull by dull people." That is our experience. History is crowded with wonder and romance, adventure and mystery, surprises and suggestions. Its fascination should be studiously fostered.

Of course, if the history taught is merely a matter of kings, battles, and intrigues in high places, and dates of occurrences which ought to have been forgotten as soon as possible after they had happened, then the subject had better be omitted altogether. But it ought not to be of that character. A capable teacher of history can make past ages live before the eyes of the children; he can give a vivid picture of the daily life and environment of the common people of other days. Their conduct, actions, and conditions should be discussed by children and teachers together, with a view to improvements for the future good of the community. Heroic virtues they should be inspired to imitate; degrading vices and unsocial conduct they should be led to detest. The worthiest actions of the noblest men and women of every age and every clime should form the chief history material to provide a standard for the children's daily aim and effort; while the errors of individuals, of communities, and of governments should be charted out as rocks and shoals and sandbanks to be studiously avoided in the days that are to come. In this way the young people in our schools can learn wisdom, which they can use in adding to life's amenities and well-being.

**SELF-EDUCATION.** At Kirkstall Road School we have long since recognized the truth that, in the ultimate, all education is self-education. The teacher is present to act as "guide, philosopher, and friend." His aim is to give the children a desire to learn, and to induce them to want to do things for themselves. They are taught how to use books of various kinds ; there are discussions, debates, lecturettes, and interviews undertaken by the children themselves, while the teacher keeps somewhat in the background, and interferes, or supplies information, only when there is a real need for it, or when he is appealed to ; and all this is a wonderful aid to self-development.

Our pupils are also trained to think and to exercise their own judgment on many things. Their minds have been brought into contact with the best poets and prose-writers of all time. On the gramophone they have heard some of the finest pieces of instrumental music, and some of the best songs. They have been on school journeys and in school camps. They have visited art galleries, museums, and neighbouring works. They know something of the rhythm of movement, they have done a good deal of dramatic work, they have been put in contact with various branches of art and craft, and they have had some training in leadership through the House and Prefect systems. In every case, the teacher's aim has been to enable his pupils ultimately to "carry on" without him ; and the extent to which that is accomplished is the measure of the value of any teacher's work.



**USE OF  
LEISURE.**

For a long time, we have seen the need of training children, not only to take their places in commerce and industry, but also to use their leisure time in a sensible way.

We cannot close our eyes to the amount of unskilled work that has to be done in this age of machinery. Tending a machine does not require much skill, nor much training. In days gone by a man made a complete article himself—a boot, a watch, or a fine piece of furniture, and he took a great pride in making it. But how can any youth or maiden take a pride in putting cardboard into a machine which turns out finished boxes by the hundred every day, or in putting points on millions of pins, or in fixing innumerable heels on boots? Far more people are engaged in these repeatable mechanical operations than in really skilled work.

David Livingstone had a Latin grammar on his bench, while he worked. One wonders what a present-day foreman would say to a workman who did that now. One also wonders whether David Livingstone would have been able to learn much amid the whirr and clash of modern machinery, the grinding of metal, and the general din.

If young workers cannot find enjoyment in their daily work, they are sure to seek it elsewhere, probably in jazz and Wild West pictures, or in other ways far more harmful. A mechanical age tends to produce mechanical types of leisure. The well-to-do worship the motor-car; the less well-to-do worship the tin hare.



The foundations of the right use of leisure can be laid in school days by developing in pupils a taste for some branch of the arts and crafts. Give them a love for music, so that they will find delight in playing and hearing only the best. Cultivate in them a love for great literature, and then all their days they will find delight in associating with the best and noblest minds of all time. Give them a love of history, and they will spend a good deal of their spare time in historical study, in visiting old ruins, and in research work. Others will add considerably to their value as citizens by becoming interested in social service, in citizenship, and in politics. Train them to love and appreciate great art in sculpture, drawing, and painting. Give them plenty of practice in designing, and frequent opportunities for self-expression in simple drama, in country dances, and in making useful and beautiful things in wood, and light metal; then they will find perennial interest in doing such things when school days are over, and so their leisure time will be enjoyably and fruitfully spent.

It is a rare thing for a Kirkstall Road pupil not to attend an evening continuation or other school, on leaving the day school.

#### COMPETITION.

however.

There are people who think that competition is entirely banished from schools like ours at Kirkstall Road. That is not so, Competition, like fire, is a good servant,

but a bad master. It may be a means of getting children to put their backs into their work; but it may also defeat the purpose for which it is intended. Unless carefully controlled, it arouses jealousy. Yet it is clear to everybody that we are all born competitors; it is in our very blood. If the competitive spirit could be taken entirely out of any child's nature, a very flabby and inert mass would be left. If a child cannot compete with his fellows at racing, jumping, cricket, and football, and in his various school subjects as well, he will not get very far. Some children can be induced to compete *with themselves*; and where that can be done, it is the best way of using their competitive impulses. But, except in rare cases, this can be done only to a limited extent. It is a much harder job for an older student to work by himself in, for example, a correspondence course, than it is to work in a class with a number of other students. It requires less will-power for him to compete with them, than to compete with himself.

Every teacher knows certain boys, just as every employer knows certain workmen, who must be subject to the competition of their fellows, or they would do no work at all. If moderately and sensibly used, competition can be a valuable spur. For school children to get into the habit of not caring whether they win or lose a game, or whether they are at the top or the bottom of the class, is disastrous. Those who would drive out competition entirely, not



only from school life, but from industrial and commercial life, are only manifesting the limitations of their knowledge of history and of human nature. Argue as we will, competition speeds up the wheels of industry and commerce, and makes a housewife have a cleaner doorstep than her neighbour. It weeds out the lazy, and rewards the persistent efforts of the industrious. It is only a danger, when it is allowed to grow out of all proportion to its usefulness. It then becomes antagonistic to sympathy and kindness, and makes co-operation in anything very difficult, if not impossible.

If we can train young people to merge, for the most part, individual competition into team competition, and to intermingle all their competitive work with genuine co-operation, they will experience the joy of unselfish service, and will gradually develop a valuable social consciousness, which will direct their work into channels leading to the common good.

**EXAMINATIONS.** Another question commonly asked is with regard to examinations.

At Kirkstall Road School we cut formal examinations down to a minimum. Whatever the merits of the multitude of such examinations, which children in many schools have to face, the great objection to them is that failure discourages, and even depresses, the less fortunate examinees. Those who are frequently unsuccessful, or always near the



bottom of the list, often lapse into an habitual feeling of inferiority, which may become a serious matter for them, resulting in what psycho-analysts term an "inferiority complex." If a child is sensitive, he thinks about his failure too much. He usually keeps the fact to himself, but he worries about it, and exaggerates its effects, and this tends seriously to impair his mental health.

Every teacher recognizes the stimulating effect of success. We have all seen the joy-light in the eyes of a boy who has been able to solve a problem in arithmetic, or produce a creditable drawing; the stimulus of success has made him work harder than ever, and his *morale* has been considerably heightened. No child will make intellectual advance, if he is constantly given work to do which is beyond his mental capacity, and in which he usually fails when an examination is held. Grown-up people become despondent and lose heart when success is constantly evading them. Sensitive children feel the humiliation of failure still more; for they have no series of successes in days gone by to give them confidence that they will ultimately succeed, and sometimes, the tragic result is permanent retardation.

The remedy is not to send these backward children into lower classes, to do the work younger ones are doing; for that is a further humiliation, which, if it can possibly be avoided, ought never to be inflicted upon them. The remedy lies in the individual treatment of each child, and in giving him assign-

ments of work suitable for his capacity, while still retaining him in his own age class.

The Report of the Joint Advisory Committee of the Association of Education Committees and the National Union of Teachers, recently issued, gives us some useful guidance on the examination question. The following points are agreed upon :—

“Inspection, accompanied by judicious examination is, generally speaking, the best means of ascertaining the quality of the instruction in school.”

“Internal examinations should be regularly and thoroughly held, and the marked papers retained for at least twelve months.”

“School records should be kept for every individual pupil, and be available for successive teachers. Reports should be issued to parents once a year.”

“Purely external examinations of a class, or age group, at regular or indicated intervals, to test efficiency, are not commended.”

At Kirkstall Road School points 2 and 3 have, in the main, been the lines along which we have worked for many years. Children up to 11+ have three term examinations during the year. Those of 11+ and over, working upon more individual lines, are frequently being tested in an informal way by means of the conversation between themselves and the teacher; and, in addition, he assesses their work by brief written tests, where necessary, and then assigns them a mark each month. But there is only one formal examination in the year, held during the



first three weeks in July. It embraces all the subjects in the curriculum, and covers all the work done by each child during the year. We find this amply sufficient, and quite satisfactory.

**RECORDS.** Records of work are kept by the head-master, teachers, and pupils. Every month each teacher sets down a mark in his work-book, and on each pupil's record card, ranging from "very weak" to "excellent," according to his estimate of the pupil's work in his subjects during the month. (See Specimens in the Appendix.) Ten of these marks are given during each school year, and a child's attainments in any subject over a number of years can be referred to quite easily when required. Such a record is of far greater value than any estimate based upon an external examination, lasting two or three hours. A dated account of the work done in each subject is also kept, so that a new teacher has no difficulty in continuing where the former teacher left off.

The children's record cards are taken home, and parents show considerable interest in watching the progress of their boys month by month, and they are always ready to support the work of the school in any way they can. Only by the harmonious working together of the Education Authority, the Government inspectors, teachers, parents, and children, can the best and most permanent educational results be obtained.



**PARENTAL  
CO-OPERA-  
TION.**

Co-operation between parents and teachers in the actual work of our school has been carefully and constantly fostered. Teachers can hardly be expected to pay periodical visits to the homes of all their pupils; but even *occasional* visiting is of great value, and occasional talks with the parents of each child are a wonderful help. The setting up of an *entente cordiale* between the teachers and the parents is worth all the time and trouble it entails.

There are still teachers and parents, however, who regard school and home as two perfectly unrelated institutions. If any real good is to be done, this notion must be abandoned. Where periodical meetings of parents and teachers can be arranged, they are very helpful. Our experience is that parents are most willing to learn all they can about the working and curriculum of the school, and are ready to fall in with any suggestions that are calculated to assist the education, and improve the future prospects, of their children. They are also communicative with regard to any defects of physique, or peculiarities of temperament, which their children may have; and that is knowledge which will be a real help to the teacher in his dealings with them.

An "Open Afternoon"—not a show day—once a term can be easily arranged, and will draw large numbers of interested parents. They can be extended to the evening, and, intermingled with a little singing, games, and dancing, will attract fathers as well as

mothers. Then the Head can explain the organization of the school, give reasons for introducing any particular scheme of work, and answer questions that are perplexing any of the parents. In fact, he can endeavour to educate them up to his own ideals, and that, too, will certainly make for efficiency.

**CONCLUSION.** Altogether we are of opinion that our Plan combines the best features of the American Dalton Plan with the best features of English traditional method. It will be especially valuable in the new senior schools, where pupils of the same age can be organized in parallel classes, and choice made from a more varied curriculum to suit their differing capacities and needs.

New methods should be introduced gradually into any school, and wisely adapted to suit the staff, the buildings, and the general conditions. To take a new system that is successfully worked in one school, and attempt to work it in another just as it stands, is "asking for trouble." No two schools or sets of conditions are alike. I advise teachers to select only those parts of our plan, or any other system, which they feel can be profitably used in their own particular school, and to appropriate them. They will find the venture well worth while.

One inspector says he does not think any teacher who is interested in his work, and has tried a modified Dalton System, would ever go back willingly to the old-fashioned methods. That is our opinion, too.



## CHAPTER X.

### PROJECT WORK.

Project work was introduced at Kirkstall Road School several years ago, mainly for the use of selected pupils in the higher classes. It is an extension of correlation, and is designed to show the application of school subjects to ordinary life. It also finds interesting employment for youthful energies, and, at the same time, provides pupils with real experiences.

As indicated before, there is a danger of specialist teachers making it a custom to mind their own business, and leaving others to mind theirs. This weakness was realized in secondary schools long before the Dalton Plan was heard of; and, as a sequel, the word "correlation" sprang into being, and became a catchword to conjure with, like the more recent catchword "self-realization." Teachers in a school were invited to put their heads together, and make their courses of work intermingle and even overlap, in such a way as would lead pupils to see that the various school subjects were closely interrelated, and formed parts of one whole. The idea was all right; but, as usual, some teachers, who were too ambitious, overreached themselves in their efforts to show that they were quite up-to-date, with the result that, in actual practice, there was a great deal of confusion. A literature lesson was often



more history and biography than literature, and a nature lesson more geography and incidental talk than nature study. In fact, it was sometimes difficult for an observer to tell what *was* the main theme of the lesson. In some classes the work got into an inextricable tangle; teachers were so busy correlating something to something else that they never got anywhere. Before long, a strong re-action set in, and then each subject was kept more exclusively to itself than ever. The position has eased since those days, and correlation has, more or less, found its true level.

What I want pupils to see is, that the work done *in* school can be of use *out* of school. In project work they see for themselves that they have been learning many things in school, not merely because the teacher desired it, but because of their real value.

We are all more or less acquainted with what the American educationists call "practicums," or the application of acquired principles. Pupils learn, for instance, certain principles in mensuration, or trigonometry, and then apply them by going out to measure up the area of a field, the height of a church steeple, a factory chimney, or a hill, or the width of a river. This is the best way to begin project work. When they can do this, enlarge the circle, so as to bring in more than one subject.

A project is really a complete piece of work carried out under the conditions of ordinary life,

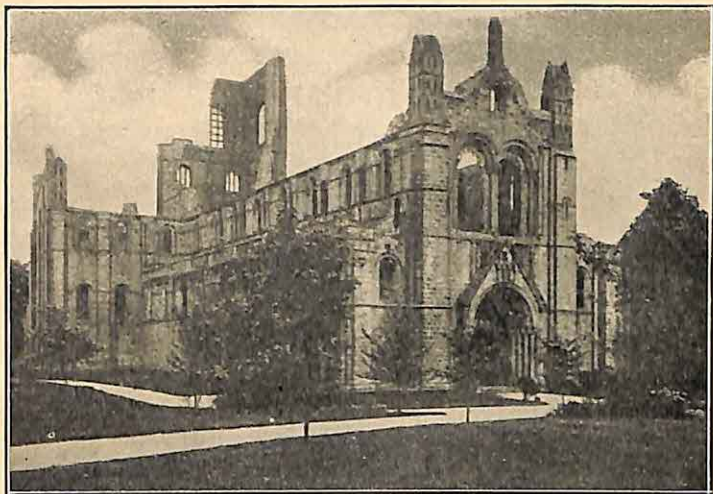
and the working of projects will help older pupils, before they leave school, to realize that school life is closely allied to out-of-school life, and that the teacher's aim, all the time, is to prepare them for complete living.

Our boys usually went out in pairs, and spent a whole morning or afternoon, sometimes more, in carrying out investigations, taking notes, making sketches, consulting people on the spot, etc. They were eager to shoulder the responsibility, and were too interested in the work to abuse the trust reposed in them. The report of each visit was always brought to me for inspection and comment.

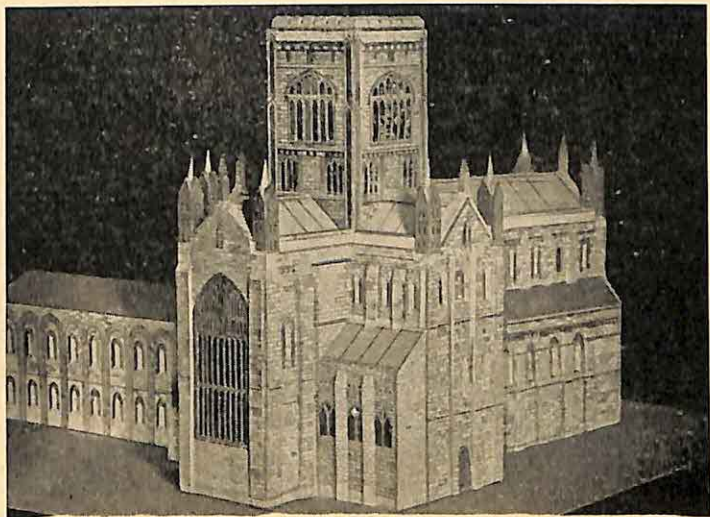
The project on Kirkstall Abbey is given with the answers in full, as they were done by a boy of 14. The only corrections made are of a few spelling and grammatical errors. Additional specimen projects are given in the Appendix. These and others have all been successfully worked by various senior pupils, with great pleasure and profit to themselves; and the doing of them has given them a deeper and more accurate impression of educational possibilities and values than could have been gained in any other way.

### KIRKSTALL ABBEY.

- (1) Describe the means of getting there.
- (2) Draw a map of the neighbourhood, and put in a small plan of the Abbey. Colour it, and insert names.



Ruins of Kirkstall Abbey as they exist to-day showing the western doorway.



Photograph of model of Kirkstall Abbey (restored), showing the great east window.



- (3) Write a description of the Abbey as it is to-day.  
N.B.—Make notes on the spot.
- (4) Read up the history of the Abbey, and then write a summarized account of it.
- (5) Write a letter to a friend arranging to meet him, and spend an afternoon at the Abbey to inspect the ruins.
- (6) Write a composition on “A Day in the Life of a Kirkstall Abbey Monk in olden times.”
- (7) Make a drawing of Kirkstall Abbey, showing the great east window. (Rough sketches to be made at the Abbey.)
- (8) Read all you can about the different kinds of architecture (see me for books), and then write an account of Norman architecture.
- (9) Read about the general destruction of abbeys in Henry VIII's time, and be able to tell about it.
- (10) Write a ghost story with Kirkstall Abbey for its setting.
- (11) Write a composition showing the value of public parks, and other open spaces, to people who are living in towns and cities.

#### QUESTION 1.

How to get to Kirkstall Abbey from Kirkstall Road School.

The best way to reach Kirkstall Abbey from here is by the electric tramway. The nearest tram-stop to the school is at Haddon Place, and is shown by an oblong-shaped piece of metal, mounted about

half-way up one of the standards which hold the electric trolley wires. This sheet of metal bears the words, "Tramways Fare Stage."

To obtain a car to go to Kirkstall Abbey, you must cross over to the side of the road opposite to this school, and enter any car going towards the west, or which is marked: Kirkstall Abbey, Horsforth, Guiseley, or Yeadon.

After mounting the steps on to the platform, you may either ride on the upper or lower deck. If you want to see the locality, I should advise you to ride on the upper deck, as you will then have a better view of anything you pass *en route*.

When you are asked by the conductor as to where you want to go, tell him "Kirkstall Abbey," and he will immediately punch you a ticket which he will give you on receipt of three halfpence.

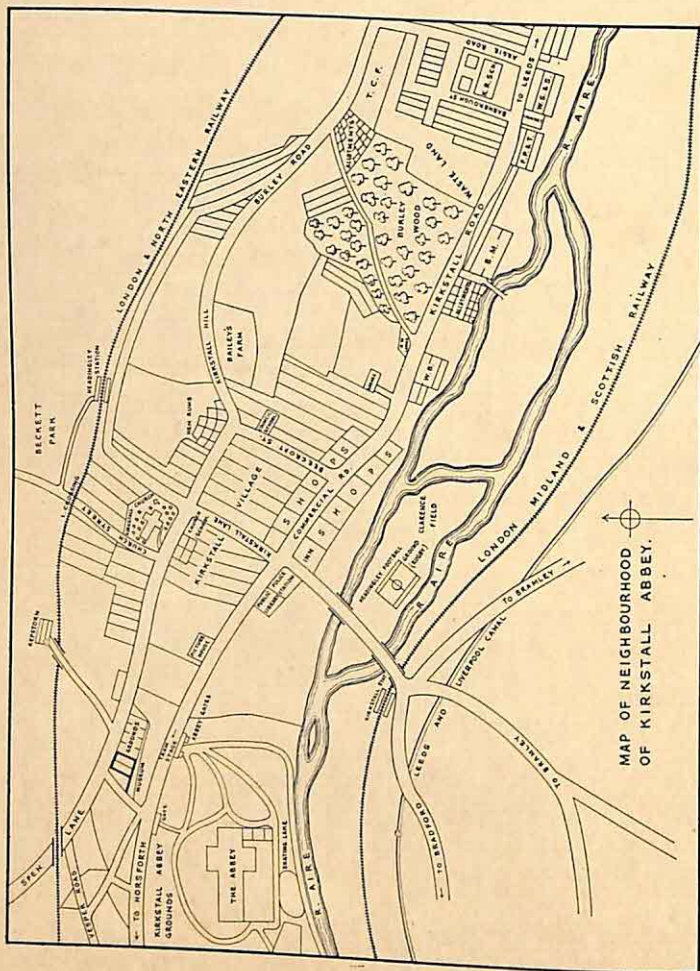
On the journey you will pass houses, shops, factories, and fields, and you can see the river Aire almost the whole time, running parallel to, and only a short distance from, the road.

Kirkstall Abbey is either the seventh or eighth stop from Haddon Place. It is marked by a lodge with three gates. Get off the car and enter the grounds.

QUESTION 2.

Map of neighbourhood showing position of the Abbey.

The river, canal, railway, roads, and buildings are in different colours.



In the pupil's drawing from which the above is reproduced a colour scheme was used for distinguishing houses, schools, grassland, roads, the River Aire, etc. The school is marked on the right-hand side, K. R. Sch.



## QUESTION 3.

Notes on Kirkstall Abbey, etc.

The first impression of Kirkstall Abbey is a jumble of massive stone walls, on which is mounted a tower some 117 feet above ground level. This tower stands erect, and can be likened to the head of Caractacus held proudly high in his march through Rome as a slave.

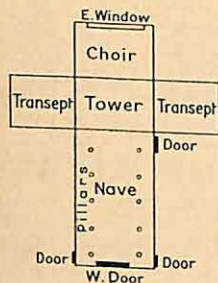
To some people the Abbey only means pleasure, but to others, pictures of the old monks at their duties arise before their eyes.

On reaching the Abbey, it is the custom of visitors to speak to the parrot, whose cage is fastened on to the walls of the tithe barn, now used as the refreshment room. Next to this are the refreshment stores, whilst across the tram line is the Museum, where the old relics are kept.

After seeing this, we pass to the postern-gate, which leads into the cloister court. Local people say that it is the original gate, but I am not sure.

The cloister court is 143 feet long by 114 feet wide. On the north side stands the church, and on the east, the Chapter House. These have partly escaped being built up by modern masonry ; but the south side, where stands the refectory, at the back of which is situated the Abbot's house, has been walled up. The Church is in the shape of a cross, pillars of about four feet in diameter divide the aisles from the nave.

The length of the nave and the choir is 177 feet, and the width of the choir is 26 feet. The roofs over the aisles are arch-shaped, but the nave roof has disappeared through the ravages of time.



THE CHURCH.

The tower stands where the two arms cross ; only half of it remains, however. The east window is 30 feet high, the top being 39 feet from the ground.

The Chapter House is a long, low building ; its arched roof is supported by massive stone pillars. Stone coffins are ranged round it, and four are let into the wall.

#### QUESTION 4.

A summarized account of the history of the Abbey.

Henry de Laci fell ill, and he became so near death that he vowed that if he was made better, he would build a monastery. He gradually became better, and so he founded an abbey at Barnoldswick in Craven, in 1147. However, because of the bleak moors it was removed to Kirkstall, then named Crystal, which was a well-wooded, sheltered place in the vale of Aire. Abbot Alexander lived till after the erection of the Abbey at Kirkstall.

All went well at the Abbey until the dissolution of monasteries in the reign of Henry VIII, when Abbot Ripley surrendered the Abbey to the Crown.

## QUESTION 5.

A Letter to a Friend.

7 Church View,  
Burley, Leeds.

Dear Tom,

As the weather is becoming warmer as each day passes, I thought it would be a good plan to spend a day somewhere in the country, and near my abode. After a good deal of thinking, I decided that Kirkstall Abbey would be an ideal spot.

In addition to what I have said, we could spend a jolly time inspecting the ruins. This pastime is not as dry as some people imagine it to be; on the contrary, it is very interesting, especially if you have read the little guide-book to Kirkstall Abbey, in which it says that treasure is hidden at the Abbey. I thought that if I had a companion, it would be nice for both of us. You being my best friend, I naturally thought of asking you to come.

If you can come, write and tell me when and where you will meet me.

I remain,

Your faithful chum,

George.

## QUESTION 6.

A Day in the Life of a Kirkstall Abbey Monk.

“Ding-ding-dong-dong!”

The rising bell tolled out its notes into the cold stillness of the grey dawn. With many a grunt, yawn, and shiver, we monks rolled lazily on to the



cold, stone floor, but immediately jumped back on to the sacking with a loud "Ouch!"

Into our gowns we slipped, and thrust sandals on to our feet.

We trooped into Church for matins, and soon after we broke our fast.

After walking about in the warmth of the rising sun for about half an hour, we went to our daily duties. It was my lot to attend to the gardening; this was my favourite hobby.

At noon we went into Church for a short service, then we had our dinner.

After thanking God for our food, we repaired to the Cloister Court, where we spent a short time in walking about. From about two o'clock till five, I sat on the banks of the river, and caught fish for the next day, which was Friday. In all I caught eighteen good-sized fish.

At five I walked back to the Abbey, and had my evening meal. Soon after that we had the evening service, and sang the vesper hymn. Later we retired to bed to be ready for the midnight service.

#### QUESTION 7.

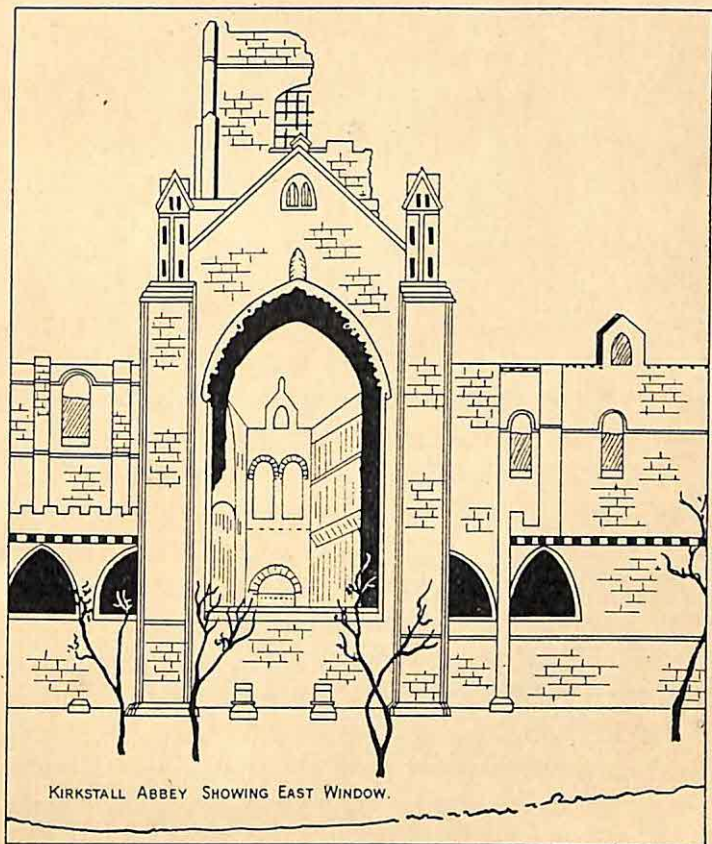
A drawing of the Abbey, showing the great east window (*see page 103*).

#### QUESTION 8.

Norman Architecture.

Architecture is divided into two systems, Classical and Gothic.

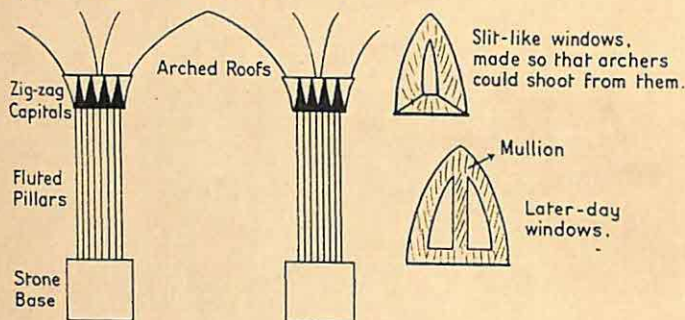
Classical architecture thrived mostly in the days of early Christianity.



Norman architecture is of the Gothic system, and dates in England from the Norman Conquest (A.D. 1066) to A.D. 1200.

The Normans built their buildings on the defensive

style. The walls were three or four feet in thickness. The pillars were small, but had a gigantic diameter, they were also fluted.



The capitals are decorated in that queer way peculiar to Norman architecture, the zig-zag fashion.

The roofs were arch-shaped, and rested on the pillars. This was because more space could be bridged by arched than by flat roofs.

The windows were narrow, but were made so that archers could shoot from them.

A tower was built on each castle, from which to watch for approaching enemies.

As the people grew peaceful, two windows were put near each other, and were divided by a column of stone called a mullion. These were called "later-day windows."

#### QUESTION 10.

An original Ghost Story of Kirkstall Abbey.

Boom! The last faint sound of the Town Hall clock died away; and, to the watchers hidden away



in a shrub in Kirkstall Abbey, the hour of midnight was mystic and entrancing.

The three lads, Jack, Harry, and Tom, were bent on seeing the ghost—the cause of a rumour in the district.

Slowly the minutes rolled by, and still no sign of the ghost.

Quarter past twelve was struck far away.

“Oh, it’s all bosh about the ghost,” growled Tom.  
“We have come on—Listen! What was that?”

The three strained their eyes, and, sure enough, their ears heard a clear unmistakable sound, that of the tolling of a bell.

It stopped, and then a sound as of shuffling feet came to their ears. It was rapidly growing nearer, and soon they heard a jumble of low, excited voices.

The next moment a mass of grey, shadowy figures came out of the gloom, and led to the postern-gate.

By now the boys could see who the figures were. At the head of the procession walked a tall, stately figure, obviously the Abbot. Behind came men dressed in the clothes of the Court in the sixteenth century. To the rear of these glided thirty or forty monks.

They filed into the courtyard, and floated across to the Chapter House, the chums following.

Arrived at the Chapter House, the Abbot sat at the end of a raised platform,

Then he spoke in a tone of emotion:—“What dost thou want of us?”

Immediately the babel ceased, and then the harsh, grating voice of Thomas Cromwell broke the silence.

"My master, His Gracious Majesty, King Henry, commands that you surrender this Abbey and all its belongings to his noble person. Disobey on pain of death!"

With head sunk on his breast, Abbot Ripley, for 'twas he who answered, said, "I surrender."

Boom! The stroke of one descended on the sleeping countryside. Only the cold breezes moaning round the sombre grey Abbey remained to remind the boys of the pitiful scene they had just witnessed.

#### QUESTION 11.

The value of parks and other open spaces to town dwellers.

Town life, as most of you know, is very different from country life.

England of to-day is a very great industrial country, so different from the England of centuries ago, when most of our people lived in the country, and toiled on the land.

Life in large, industrial centres, where tall chimneys belch out great volumes of soot and smoke, cannot be very healthy; on the contrary, the conditions tend to bring on awful diseases such as consumption, and one's nerves are readily upset by the constant noise and bustle of machinery and traffic.

The people wish to get some peace and quiet, and as they cannot get it in the towns, they must either get it in the country, or in parks. Parks and other open spaces are the next best things to the countryside. In them you can, for a short period, forget that you live in a nasty smoky town.

Leeds has many parks besides Kirkstall Abbey. Of these, Roundhay Park is the largest and most beautiful. It has two lakes, playing fields, gorge, canal gardens, and a great number of trees and flowers.

These masses of vegetation breathe out pure oxygen, and take in carbonic acid gas and other impurities from the atmosphere, and so help to purify and cleanse it.

Temple Newsam is another fine, large park in Leeds, recently bought by the City Council, which many people visit, to get away from the smoky streets of Leeds.

Burley Park, in which we sometimes play games, Woodhouse Moor, and Armley Park are other open spaces near us, in which we may get a breath of fresh air.

In summer, bands play in the parks in order to induce more people to visit them, and so keep themselves healthy.

Cricket, tennis, and bowls are played in the parks in summer, and in winter pleasing winter games, such as football, are played.

In spring and summer the flowers are very



beautiful, and they help people to appreciate the beauties of nature more than they would do otherwise.

To people who cannot afford to go to the seaside, or in the country, for their holidays, these parks, well kept by the gardeners, are a great boon.

## APPENDIX.

MORNING TIME-TABLE for OUR PLAN  
of INDIVIDUAL WORK.Kirkstall Road Demonstration School, Leeds.  
Boys' Department.

9-0 to 9-30	9-30 to 10-45	10-45 to 11-0	11-0 to 12-0
Religious Instruction.	Subjects below.	Recreation.	Subjects below.

Room 1. Art Work and Handicraft—Classes Sen. 1 to 4 (Mr. Dx.)

„ 2. Geography and History	—	„	„	(Mr. B.)
„ 3. English	—	„	„	(Mr. D.)
„ 4. Mathematics	—	„	„	(Mr. M.)
„ 5. Physics	—	„	„	(Mr. G.)
Reading	—	„	„	(Mr. E.)

Other subjects are taken in the age classes in the afternoons, and then class teaching is more in use. Intermediate and Junior classes have a separate time-table.

## CHILDREN'S RECORD CARDS.

Kirkstall Road School.			
RECORD CARD.			
S.			
ENG. ..			
READ. ..			
MATHS.			
SCI. ..			
GEOG. ..			
HIST. ..			
ART ..			
H-WORK			

Blank Card.

S. stands for Senior.

S.4 means Senior 4 Class.

W.=Weak. F.=Fair, etc.

Kirkstall Road School.			
RECORD CARD.			
<i>George Bold.</i>			
S. 4.	Sep.	Oct.	Nov.
ENG. ..	G.		
READ. ..	V.G.		
MATHS.	W.		
SCI. ..	F.		
GEOG. ..	V.G.		
HIST. ..	G.		
ART ..	Ex.		
H-WORK	V.G.		

Card marked for  
September, and  
initialled by me each month  
when completed.



## SPECIMEN ASSIGNMENTS.

*K.R. Dem. Sch.**Class—Sen. 3 (=Std. 7).**English Assignment—September.*

In this first assignment, study Lessons 1, 2, 3, 4 in your Dalton English Course, Book 5.

The extracts in the first three lessons are from *As You Like It*, one of Shakespeare's great comedies. Briefly, this is the story :—

A French duke has been driven out of his dukedom by his brother, and has taken refuge with a number of his faithful followers in the Forest of Arden, where they spend most of their time in hunting.

This duke had one daughter, named Rosalind, who was kept at the usurper's court to be a companion for his daughter, Celia, Rosalind's cousin, and they were very devoted to each other.

Orlando, younger son of Sir Rowland de Boys, defeated the famous Charles the Wrestler, but was banished from the Court, and went away towards Arden. His elder brother, Oliver, had treated him very badly. Rosalind, who had fallen in love with him, decided to follow him, and Celia went with her. Rosalind went dressed up as a boy, and Celia as a peasant girl.

They met Orlando in the forest, and in the end Orlando married Rosalind; and Oliver, who had repented of his wicked deeds, married Celia.

Celia's father gave up the dukedom, and Rosalind's father was then restored to his rightful position.

Read the extracts very carefully, and be able to give the explanations asked for in the first Instruction in each lesson. Some of the words can be found in your dictionary. If you cannot discover the meaning of any of the phrases or allusions, come to me.

To answer Instruction 3, Lesson 1, see the story of Robin Hood in the Reference Library.

In studying Instruction 6, Lesson 1, remember that a word is grammatically classified according to the work it does in a sentence. The same word may be a noun in one sentence, an adjective in another, and a verb in a third, owing to the different work it has to do, *e.g.* :—

(1) The collar is made of *iron* (noun).

(2) The prisoner is wearing an *iron* collar (adjective).

(3) The maid will *iron* your collars (verb).

In Instruction 4, Lesson 2, give the account in time sequence, *i.e.* speak of the incidents in the same order as that in which they happened.

When you come to Instruction 4, Lesson 3, refer to any industrial disputes going on in the country, if there are any, and show how they may be avoided. Ask somebody at home to tell you about co-partnership in business, and the results of its application. It is in operation at Blackburn's Ltd., the printing firm in Cardigan Road, Leeds.

Lesson 4 is from the Bible. You should read

about Absalom's conduct before the battle in 2 Samuel, Chapters 15, 16, 17.

Your father or brother, or any man who has been in the Great War, will help you with Instruction 2, Lesson 4.

Study Instruction 6, Lesson 4, very carefully. See that you fully understand the meaning of all the words and phrases in each of the verses from Gray's *Elegy* before you begin to write. Merely putting the language in prose order, or changing a word here and there, is not sufficient. You must put your paraphrase into good easy prose, not too lengthy, but in such a way as will enable anybody to understand the whole of each verse after a first reading of what you have written.

Take this as another example; it is a verse from Longfellow's *Ladder of Saint Augustine*.

“The heights by great men reached and kept,  
Were not attained by sudden flight;  
But they, while their companions slept,  
Were toiling upward in the night.”

Here is a paraphrase of it:—

Famous men have not reached the eminent positions they occupy, by luck, or even by two or three big efforts. They have worked hard and long, while many of those who have been less successful have been spending their time in enjoying themselves.

N.B.—In all your compositions write neatly, avoid alterations, arrange your work in paragraphs, and be careful with spelling and punctuation. Come to me when you are in doubt about anything. You



will find it best, with some exercises, to make a rough outline on a piece of scrap paper, before beginning to write in your book.

*K.R. Dem. Sch.*

*Class—Sen. 1 (=Std. 5).*

*Mathematics Assignment—December.*

Revise your knowledge of vulgar fractions from the earlier part of your Cambridge Arithmetic, and then I shall want you to apply that knowledge to shopping sums and invoices. This is very interesting work, but it must be accurate.

I. STUDY.

- (1) Examine the diagram shown on page 6, and put at the sides of it the common multiples of three of the numbers at a time.
- (2) Which fractions are easier to add and subtract, decimal or vulgar fractions? Why? Give several examples of each.
- (3) Learn No. 10, page 15, and be able to tell me all about it.
- (4) Draw the plan as shown on page 16, No. 1, and mark with dotted lines where the carpet has to cover it.
- (5) Make a drawing in pencil to show the prices by parts, similar to the drawing on page 20.

II. WRITTEN WORK.

- (1) Work all the examples from No. 10, *A, B, C*, on page 7.

- (2) Draw a figure on squared paper similar to the one on page 13, and answer question 4 (1) and (2).
- (3) Write down the answers to the examples in letter H, after working them mentally. When you have done that, set yourself 10 similar examples, and write them with the answers.
- (4) Try all the examples yourself before asking me for help.

N.B.—A special lesson will be given you on Wednesday morning, the 11th, on “Graphs for Prices.”

*K.R. Dem. Sch.*

*Class—Sen. 2 (=Std. 6).*

*Geography Assignment—May.*

In this assignment you have to complete the study of the British possessions in Africa. These sections lie within the tropics. Try to realize the kind of climate, by having a talk with a soldier who has been in Egypt or Mesopotamia, and picture the things that are growing there, and then you will have some idea of the great changes you would find, if you paid a visit to some parts of tropical Africa. Remember, too, that nearly all these possessions are plantation colonies, where most of the work is done by natives. Africa has many parts still unexplored, but at some future time it will take a much more prominent position among the commercial nations of the world.

The second part of your work is the study of

Egypt, that land of mystery, which is always interesting. Visions arise of the ancient Pharaohs, the pyramids, the Israelites, and later the campaign of Napoleon, and Kitchener, and the work of General Gordon. The recent discoveries in the tomb of Tutankhamen remind us that there are in the City Museum an Egyptian mummy and some mummified cats and other creatures from Egypt. You must see them.

The saying is still true that "the Nile is Egypt, and Egypt is the Nile." Find out what this means. There are several books in the reference library about Egypt. Read one of them. It will carry you in thought down the ages to the time when this part of the world was the centre of civilization.

#### I. FOR STUDY.

- (1) (a) The West African possessions—Gambia, Sierra Leone, the Gold Coast, Nigeria.
- (b) British East Africa and Uganda, Zanzibar, British Somaliland.
- (c) British Central Africa—Nyasaland, Northern Rhodesia, Tanganyika.
- (2) Egypt—White Nile, Blue Nile, Victoria Nyanza, Cairo, Khartum, Alexandria, Port Said.

You will find information about these places in Lay's *British Dominions*, pages 109 to 117.

Consult the file of pictures and cuttings from the daily newspapers.

The Panorama Pictures contain views of Cairo, Karnak, the Great Pyramids, and the Sphinx.



The Travel Pictures of Africa should also be examined.

In the reference library you will find the following books, all of them helpful and interesting.

- (i) *Travel through the British Empire*, pages 90 to 132.
- (ii) *Greater Britain*, pages 147 to 182.
- (iii) *Round the Empire*, pages 155 to 186.
- (iv) *A Trip to Egypt*, pages 1 to 32.

## II. ORAL AND WRITTEN WORK.

- (1) Give a written description of
  - (a) A Visit to the Pyramids at Gizeh, or
  - (b) A Trip up the Nile.
- (2) Be able to tell me
  - (a) The chief products of the British Possessions in tropical Africa.
  - (b) Why the tropical possessions are nearly all plantation colonies. Sketch the River Nile (use tracing-paper), showing the chief mountains, tributaries, lakes, and towns in its basin.

*K.R. Dem. Sch.*

*Class—Sen. 1 (=Std. 5).*

### *History Assignment—December.*

In the November assignment you learnt about some of the events which helped to make Queen Elizabeth the most important of the Tudor sovereigns. In this assignment you will see how England was saved from an invasion by the Spaniards.

## I. FOR STUDY.

## (1) English Seamen in Tudor Times.

Henry VIII did much to encourage seamen, but it was in Elizabeth's reign that they became world-famous. Notice the names of the most important, and find out why they became famous. Think what these attacks on Spanish ships were bound to lead to. Find out where these adventures took place. Note the kinds of ship used. Come to me for pictures as you need them.

Study *Piers Plowman*, Book 5, Chapter 6.

## (2) The Defeat of the Armada, 1588.

Find out why the Armada was sent to England, and why the English were able to defeat this huge fleet. Note what preparations the English made for its coming.

Read Chambers's Book 5, Chapter 29.

## (3) Houses in the time of Queen Elizabeth.

It was in Elizabeth's reign that many of the stately mansions of England were built. Some are still in existence. Find out why so many of these houses were built at that time, what shape most of them took, and what they were made of. Study the pictures in your book, and come to me for others.

Read *Our English Towns and Villages*, Chapter 40.

For further information on this section of your history, see any of the following books in the reference library:—

(a) *Highroads of History*, Book 5, Chapter 8.

(b) *Green's Short History*, Vol. I, pages 328 to 334.

- (c) Oman's *History*, pages 291 to 293.
- (d) *An Elementary Source Book*, Part 2, page 13.
- (e) Macaulay's poem, *The Armada*.
- (f) Tennyson's poem, *The Revenge*.

## II. WRITTEN WORK.

- (1) Add to your time chart, and learn the chief event of 1577, 1588, and 1603.
- (2) Make a model in paper, with suitable decorations, of
  - (a) A Tudor House, or
  - (b) A 16th Century Ship.Come to me for instructions.
- (3) When you have read Macaulay's poem, *The Armada*, write an account of "How the news of the coming of the Armada was spread all over England."

The following are very interesting boys' books dealing with the times of Queen Elizabeth. Get one from the public library.

- (a) *Westward Ho!* (Charles Kingsley).
- (b) *Drake and his Yeomen* (James Barnes).
- (c) *Under Drake's Flag* (Henty).
- (d) *With Drake on the Spanish Main* (Beresford).

*K.R. Dem. Sch.*

• Class—Sen. 3 (=Std. 7.)

### *Art Assignment—December.*

I want you to remember that it pays to do neat, careful work. The other sort will not be accepted.



Bright, clean colours are necessary to produce a bright, pleasing effect.

Always use clean water.

### *Design.*

As far as possible, you will now apply your designs to some kind of material, and then there will be a finished article to show for your labour. You will like this work very much. It is called "Applied Art."

Carefully examine the various examples of it, which have been done by boys in Senior 4 :

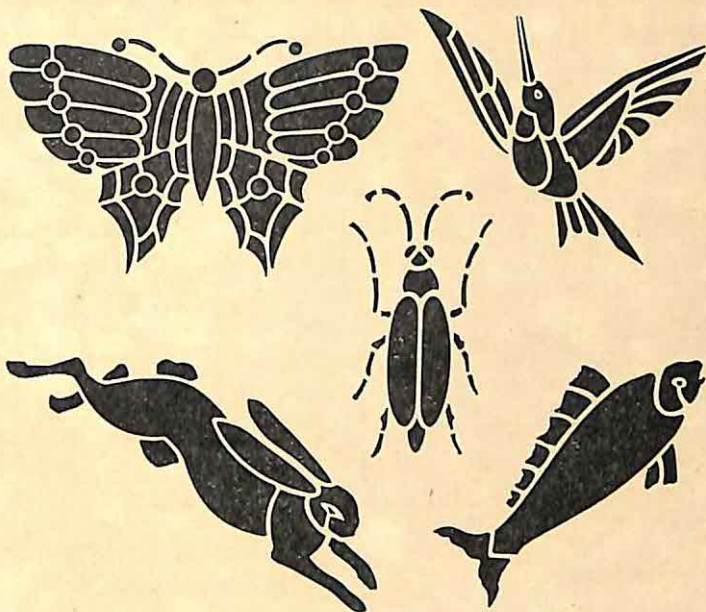
- (i) Painted tiles and plates.
- (ii) Decorated photograph frames.
- (iii) Printed blocks made from linoleum.
- (iv) Stencilled table-centres, lamp-shades, dresses, and wall-panels.

When you have done this, come to me for an exercise for yourself.

I want you to do some stencilling this month ; you will be interested in it. Here are some examples dealing with bird, animal, fish, and insect life.

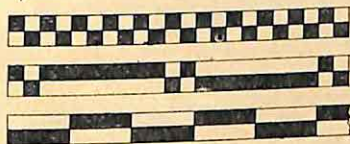
Copy any two of these, enlarging them, and when they have been approved, cut them out, and stencil the designs in your book. You shall try some original work of your own next month.

[The illustrations on page 121 are copies of the actual assignment, where, however, they are shown in suitable colours.]



*Lettering.*

For your lettering this month, print the following :—TIME WAITS FOR NO MAN.



Alternative  
Suggestions  
For  
Border

The teacher's original drawings for the above assignment are in colour.

This will be an exercise in "spacing out" and neat lettering. Roman capitals should be used.

Enclose your printing in a rectangle 9-in.  $\times$  4-in., and set it out according to the given dimensions.

On the outside edge of the rectangle draw a simple check border, similar to those suggested, but not a copy of them. You may use any colour, or combination of colours, you like in doing this.

### *Object Drawing.*

A new group of common objects has been set up for you. It consists of a wine-bottle, in front of which are two oranges. A dark-green hanging forms the background. Make a water-colour drawing of this group. Proceed as you have been taught in the class lessons, namely, "mass" first, and "detail" afterwards. Several examples of water-colour drawings have been fixed up for you to examine. Study them carefully, and aim at a similar result. Notice (a) the absence of "hard" lines, and (b) the softness of the shadows. Try to get a pleasing effect by combining good drawing with harmonious colouring.

### SPECIMEN PROJECTS.

#### I. CITY SQUARE, LEEDS.

- (1) Write a description of City Square, as a visitor would see it when entering from Wellington Station.
- (2) The centre of the Square is surmounted by an equestrian statue of the Black Prince in bronze.



A witty man once said it symbolized Leeds. Say what you think about that statement. Find out all you can about the history of this Prince, and be ready to tell me about him.

- (3) The figure of the Black Prince would assist in making a striking poster. Design one, using the statue, to advertise Leeds goods.
- (4) The approach to the L.M.S. station is out of keeping with the architecture of the surrounding buildings, and ruins the appearance of the south side of the Square. Write a letter to the Press making this complaint, and appealing for a deputation of the Council to make another approach to the railway directors.
- (5) It is estimated that tramcars enter the Square at the rate of 4 per minute, except during the "rush" hours of 12 noon to 2-30 p.m., and 5 to 7 p.m., when the number increases to 7 per minute. If the cars are run from 5-30 a.m. to 11-30 p.m., what is the total number of cars entering the Square per day, and the total number of people dismounting, if the average is 9 per car? If the receipts per car per journey are 16s. 4d., what is the daily income?
- (6) A man in the Square, at the entrance to the Station, sells daily papers. He sells 5 *Yorkshire Posts* to 3 *News-Chronicles*, to 4 *Daily Mails*, to 4 *Mercuries*, and to 3 *Daily Herald*s. The *Post* is a twopenny paper, the others are 1d. Give the number and value of each paper sold, if,

at the end of the day, the man has £2 2s. 5d., having started in the morning with 6s. 5d. in change.

- (7) Calculate the area of the circular centre, if the distance across is  $65\frac{1}{2}$  yd. It was paved at a cost of 5s. 9d. per sq. yd. What was the total cost?
- (8) Draw a map of the Square, showing the principal buildings, the statues, and the names of the streets leading to it. Insert a directional arrow for persons desirous of going by road to Otley, Bradford, Dewsbury, Harrogate, Wetherby, and York. Make rough sketches on the spot.
- (9) The statues facing the General Post Office are of the following:—John Harrison, James Watt, Joseph Priestley, and Dean Hook. Find out in what way they were connected with Leeds, and write a brief life of each.
- (10) Write a telegraph message arranging to meet a friend in front of the General Post Office instead of the City Hall.
- (11) The policeman on point duty at the junction of Boar Lane and City Square is asked, "Which is the way to the Infirmary, please?" Give his reply.
- (12) Imagine you have changed places with one of the statues in the Square for 24 hours. Give an account of what you see during that period.

## II. LEEDS.

- (1) Read up the early history of Leeds, and then write a page or two about it.
- (2) Describe Boar Lane and Briggate as they were a hundred years ago, and as they are now. Give some account, too, of the new Headrow.
- (3) Describe the Public Library you know best. Tell of its various departments, arrangement of books, children's lectures, etc.
- (4) Give a written description of Kirkstall Abbey, as seen by a visitor from another part of the country.
- (5) Read up the history of Adel Church, and be able to tell me about it. Visit the Church, and make a sketch of the Norman doorway.
- (6) Pay a visit to Roundhay Park, and then describe it in a letter to a relative who lives in Canada.
- (7) Write an account of a visit to the Art Gallery, and describe one of the chief pictures in detail.
- (8) Write an account of a visit to the City Museum, the lecture you listen to, and the exhibits in connection with it.
- (9) Give a description of the City Hall, (a) exterior, and (b) interior, and tell of its various uses.
- (10) Name the public hospitals of Leeds, and give some account of the Infirmary.
- (11) Visit Temple Newsam. Give a description of your inspection of the grounds, and of the various rooms in the Mansion.



- (12) Tell where Leeds gets its huge supply of water from, and how it is purified, stored, and distributed.
- (13) Name the chief industries of Leeds, and describe the one with which you are most familiar.
- (14) Draw a map of Leeds showing the River Aire, the chief buildings, parks, railway stations, with the lines entering Leeds, tram routes, and bus routes, and mark clearly the position of your school. Make use of an ordnance map.

### III. WOOL.

- (1) Describe a visit to an English sheep farm, and tell of the things you see there.
- (2) Find three or four poems about shepherds in your poetry books; write the titles, and the names of the authors.
- (3) Give an account of a shepherd's life among some of the hills of Britain.

Make an original drawing of a shepherd with his crook and sheep-dog.

- (4) Learn Psalm 23 by heart.
- (5) Describe one of the Australian sheep-runs, after reading about them in your geography books.
- (6) Here is a table showing the number of sheep in the chief sheep-rearing countries of the world. The figures are in millions :—(i) Australia, 85m. (ii) Russia and Siberia, 72 $\frac{1}{4}$ m. (iii) U.S.A., 48 $\frac{1}{2}$ m. (iv) The Argentine, 43 $\frac{1}{4}$ m. (v) S. Africa, 31 $\frac{1}{2}$ m. (vi) United Kingdom, 27 $\frac{1}{2}$ m. (vii) Turkey. 27m.

- (viii) Uruguay, 26m. (ix) New Zealand, 25m.  
(x) India 23m.

Trace a map of the world, put in the names of these countries, and the numbers given in the table.

- (7) Tell how wool is prepared for spinning.
- (8) Visit a mill, and then give an account of spinning and weaving, cloth-finishing and dyeing.
- (9) Make a drawing of an old-fashioned spinning-wheel. You will find one in the City Museum.
- (10) Pay a visit to a clothing factory, and then tell how the people do their work there.
- (11) Find out first the weekly, and then the yearly, wages, paid in a factory employing a hundred workpeople, including manager, foremen, and forewomen, clerks, and other employees; your parents will help you with the necessary information.
- (12) State how Leeds became connected with the wool trade. Tell what its position is to-day with regard to the manufacture of ready-to-wear clothing. Where is most of it sent to?
- (13) Draw a map of the West Riding of Yorkshire, and insert the "wool" towns.
- (14) Write the story of the Golden Fleece in your own words.



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